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ABSTRACT

An evaluation was conducted to determine the effects of the General Electric Foundation Summer Institutes on Career Education and Guidance over a one to two year period in participating school districts and communities. The study evaluated the team-oriented institutes held in 1976 and 1977 at the University of South Carolina and Indiana University. The report describes the procedure used for designing the evaluation study, identifying the potential data, selecting the sample of school districts to be included in the study, and collecting and analyzing the data. Results show that the institutes had high impact on career education activity in two districts, moderate impact in one, and low impact in three. Substantial gains in personal and professional development were reported by most participants. Conclusions, policy implications, and recommendations were formulated for professional and personal development and team and team plan aspects of the institutes. It was recommended that the institutes be continued with modifications in the schedule and activities of the institutes and in pre-institute and post-institute operations. (Appended is a schedule of questions on impact and factors influencing impact.) (Author/CSS)

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EVALUATION OF THE GENERAL ELECTRIC FOUNDATION SUMMER INSTITUTES ON CAREER EDUCATION AND GUIDANCE

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April 1979

U.S. DEPARTMENT OF HEALTH, EDUCATION & WELFARE
NATIONAL INSTITUTE OF EDUCATION

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FOREWORD

The critical need for more effective and extensive career education and guidance has been recognized nationally in recent years. The nation's schools are being challenged to provide the career awareness, exploration and preparation necessary for students to make rational career choices and to enter and progress in a wide range of careers.

The General Electric Foundation is to be commended for its efforts to increase the effectiveness of career education and guidance in many local school districts throughout the country by providing in-service education programs for teachers, counselors and administrators. The commitment of the Foundation to improving the effectiveness of career education and guidance programs is particularly evident in its annual sponsorship of the Summer Institutes on Career Education and Guidance.

The National Center for Research in Vocational Education is pleased to have had an opportunity, under a grant from the Foundation, to assist by preparing this report on an evaluation of the impact of the Institutes on local school districts, on the factors that influenced that impact, and on suggested ways to improve future Institutes and related programs and activities.

The National Center for Research in Vocational Education expresses its appreciation to the many individuals who contributed to this report. Thanks are extended to the administrators, teachers, counselors and students in the local school districts, to the representatives of local General Electric plants, and to other community leaders who provided data and assistance in collecting data. A special indebtedness is acknowledged to William A. Orme, Joseph M. Bertotti, Thomas J. Sweeney, and other General Electric Foundation officials who provided advice and guidance on planning and conducting the evaluation study. Appreciation also is extended to several National Center staff members: to Kenney E. Gray, project director, and Terrence K. Pierson, project assistant, who conducted the study and prepared this report; to Edward J. Morrison, under whose general direction the study was conducted; to N. L. McCaslin, who provided basic concepts and continuing consultation; and to Richard Miguel, Harry Drier, and Bruce Reinhart, who made valuable contributions in their critical reviews of the manuscript prior to final revision.

Robert E. Taylor
Executive Director
The National Center for Research
in Vocational Education

ABSTRACT

This report describes an evaluation of the Summer Institutes on Career Education and Guidance sponsored by the General Electric Foundation: the background of the project, the methods and procedures used in the evaluation, the findings, and the conclusions, implications and recommendations. Six school districts that had participated in Institutes were analyzed using on-site case study methods and interviewing techniques to answer two evaluation questions: (1) What has been the impact of the Institutes on local school districts and communities? and (2) What factors influenced this impact? Results show that the Institutes had high impact on career education activity in two districts, moderate impact in one, and low impact in three. Substantial gains in personal and professional development were reported by most participants.

An Executive Summary of the full report has been prepared as a separate document. The Executive Summary contains a brief description of the background of the project and the methods and procedures used in the evaluation, and a verbatim copy of the summary of findings, and the conclusions, implications and recommendations from this report.

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BACKGROUND AND EVALUATION QUESTIONS

Background

Career education activities are receiving increasing attention in many public schools throughout the United States. This trend is described by Goldhammer and Taylor (1972) as "a systematic attempt to increase career options available to individuals and to facilitate more rational and valid career planning and preparation." The emphasis on career education activities is based on the recognition that work is a large part of one's life roles and a determiner of one's social and economic well-being. Career education activities are designed to influence students in eight areas: (1) self awareness, (2) career awareness, (3) educational awareness, (4) economic awareness, (5) career decision making, (6) beginning career competency, (7) employability skills, and (8) attitudes and appreciation. The U.S. Office of Education (1972) describes career education as "the total effort of public education and the community aimed at helping all individuals become familiar with the values of a work oriented society, to implement those values in their lives in such a way that work becomes possible, meaningful, and satisfying to each individual."

Career education goals are difficult to achieve since most teachers, counselors, and administrators have no experience and limited knowledge of careers outside education. To remedy this difficulty, the General Electric Foundation has for the past ten years sponsored five-week Summer Institutes on Career Education and Guidance* at two or more universities each year for educators from selected school districts throughout the United States. The Institutes were designed to increase educators' abilities in the field of career education and guidance and to enable them to implement more meaningful career education and guidance programs in their respective school districts. The specific objectives stated in an Institute brochure include the following:

1. To ensure that each participant has many opportunities to gain experiences needed to work effectively with children and youth
2. To provide the participants with opportunities to develop their skills in group procedures as they relate to career education and guidance
3. To give participants an opportunity to learn the function and significance of industry to the national economy and culture of the United States
4. To provide participants with the necessary skills to cope with cultural differences and the ever changing social attitudes within the communities they serve with specific emphasis on minorities and females
5. To help participants develop models of the successful person in business and industry
6. To provide participants information on the careers and job opportunities available in industry, including required education and experience, incentives, and opportunities for advancement
7. To give participants information on the educational training programs available for trade, technical and supervisory positions in industry
8. To encourage participants to develop new methods and techniques for meaningful communication with youth about their future.

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*The General Electric Foundation Summer Institutes on Career Education and Guidance will be referred to as the Institute throughout the remainder of the report.

To fulfill these objectives the Institutes have utilized a variety of techniques, materials and resources. The participants were provided living space in one building in order to enable them to experience both formal schedules of sessions and informal interaction and sharing across diverse school district settings. Career education curricula materials and resources were provided for participants to review. Seminars with experts from business, industry and education were conducted. Personal growth sessions were held. Shadowing experiences were provided in local business and industry to broaden participants' awareness of various work roles, environments, skills and education requirements.

Formally, each district was represented by one or more persons who functioned as individual participants. In 1976, efforts were made to have each district send a five-person team composed of teachers, counselors, and administrators. Each district's team was to represent one or more schools and one or more levels (e.g., junior high and high school) within the district. Team members were to conduct a needs assessment in each school district and to formulate goals for career education and guidance that they would pursue in their experiences at the Institute. A principal focus of the Institutes has been for each team to write a plan for accomplishing the goals formulated for the district. The plan was to be a comprehensive action-oriented project by each team that could be implemented in the local school district when the team returned home. This team plan technique has been used by the Institutes to facilitate implementation of career education and guidance programs in the local school districts.

The location and number of school districts by state that participated in the Institutes in 1976 and 1977 at the University of South Carolina and Indiana University are shown by State in Figure 1. The school districts are located primarily in States east of the Mississippi River. The names of the school districts as well as people who participated in the Study are confidential and not revealed in this report. Confidentiality was approved by the Foundation before data were collected and communicated to each of the participants in the study.

Evaluation Questions

Although information about the success of the Institute has been routinely collected at the completion of each Institute, little attention has been given to providing an independent evaluation of the effects of the Institute over a one to two year period on the school districts and communities that sent teams. To study this question, the evaluation study addressed the first of the team-oriented Institutes held in 1976 and 1977. The Institutes evaluated were those held at the University of South Carolina and Indiana University.

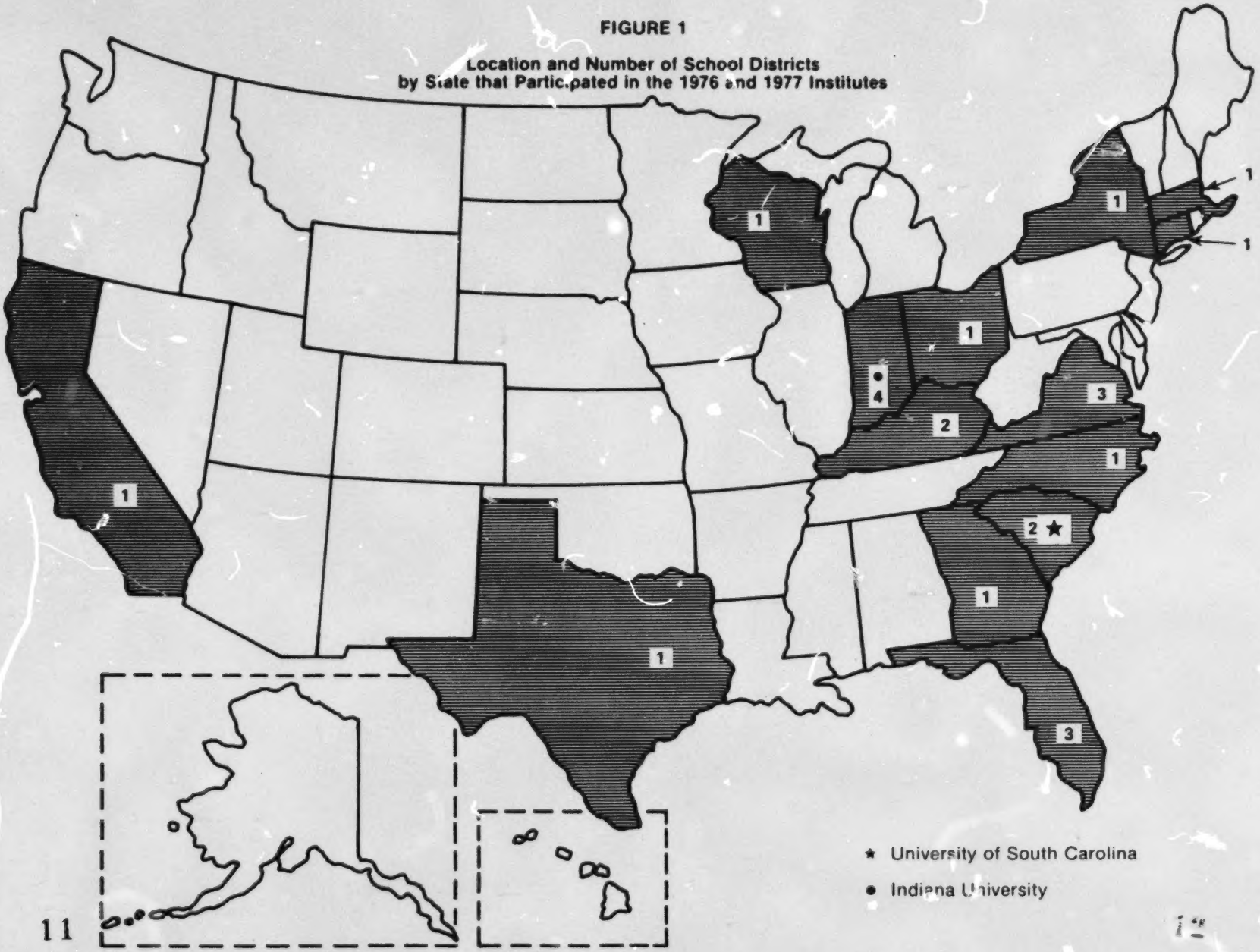
The study was centered on the following evaluation questions:

1. What has been the impact of the Institute on local school districts and communities that participated?

2. What factors influenced the impact of the Institutes on these school districts and communities?

FIGURE 1

Location and Number of School Districts by State that Participated in the 1976 and 1977 Institutes



METHODS AND PROCEDURES

The methods and procedures used to evaluate the Institutes included designing the evaluation study, identifying the potential data, selecting the sample of school districts to be included in the study, and collecting and analyzing the data.

Designing the Evaluation Study

For the purposes of this evaluation project, the case study method was selected over the traditional survey strategy since differences in school districts, their teams, and the team plans rendered the advanced formulation of standard evaluation questions inappropriate. The case study method allowed for data collection through document reviews as well as through interviews. The preliminary collection of data from such documents as the team plan, annual and special reports, and communication with the school provided helpful background information that enhanced the relevance and effectiveness of the follow-up interview. Interviews provided the opportunity not only to solicit data but also to pursue further issues suggested by the data. Information obtained from interviewees could be cross-checked with other interviewees and with the documents that had been reviewed.

At the outset of the study it was recognized that many school districts have been influenced by the career education movement over the last ten years. The U.S. Office of Education and many state departments of education, universities, and other public agencies and commercial publishing companies have been active in developing and disseminating materials and in conducting many national, state and local conferences and seminars on career education. Many universities have initiated undergraduate and graduate courses in career education for teachers, counselors, and administrators. Some state and local boards of education have provided organizational and financial support for career education.

Given this dynamic movement of career education and the two evaluation questions addressed by this study, the basic approach of the study was to identify within school districts the career education and guidance activities, services, and resources *before* and *after* the Institute and to ascertain if the changes in career education and guidance were influenced by the team's participation in the Institute.

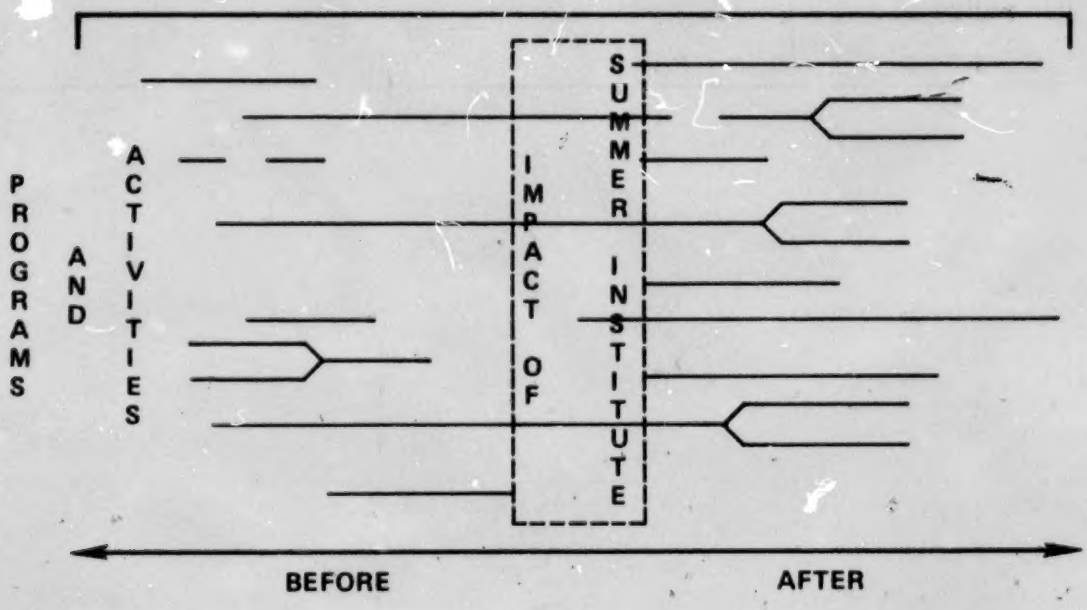
A graphic description of the ways in which the Institute might influence career education and guidance activities in a school district and community is shown in Figure 2. The figure illustrates that activities and services that existed before the team attended an Institute might continue, be redirected or terminate. In addition, new activities and services might be initiated following the Institute.

Such changes *may* or *may not* be the result of the team's participation in the Institute. A change that grew out of a team's participation in the Institute was considered an *impact of the Institute*.

The evaluation study was to also assess *the factors which influenced the impact* of the Institutes. An Institute was viewed as an ongoing process with three phases: (1) pre-Institute planning, (2) programs and activities of the Institute, and (3) post-Institute implementation. Agencies and procedures associated with these phases were identified as the range of possible factors.

FIGURE 2

Summer Institute Impact on a School District and Community



Assumptions

Identifying data to be collected was done within the parameters of the following assumptions:

1. Areas of potential impact in a school district and community can be identified.
2. Numerous factors affect the impact of the Institute on a school district and community.
3. The impact of the Institutes on the local school districts and communities is an ongoing process. Changes in education concepts and programs may take more than two years to be realized.

Potential Areas of Impact

The first assumption allowed the identification of potential areas of impact. A review of the literature dealing with innovations in career education (Pascal et al., 1975, Pepperman et al., 1976), and the study of team plans that were developed at the Institute resulted in the identification of the following potential areas of impact of the Institute:

1. Personal/professional development of team members
2. Staff development of non-team educators
3. Curriculum and instruction
4. Guidance and counseling
5. Community involvement.

Personal/professional development of team members was the primary objective of the Institute. The other potential areas of impact were identified on the basis of their relevance to career education and guidance programs and activities. Different goals, objectives, strategies and techniques of the individual team plans would lead to differences in impact among the districts. Differences in agencies and operating procedures would also have an influence.

Potential Factors Influencing Impact

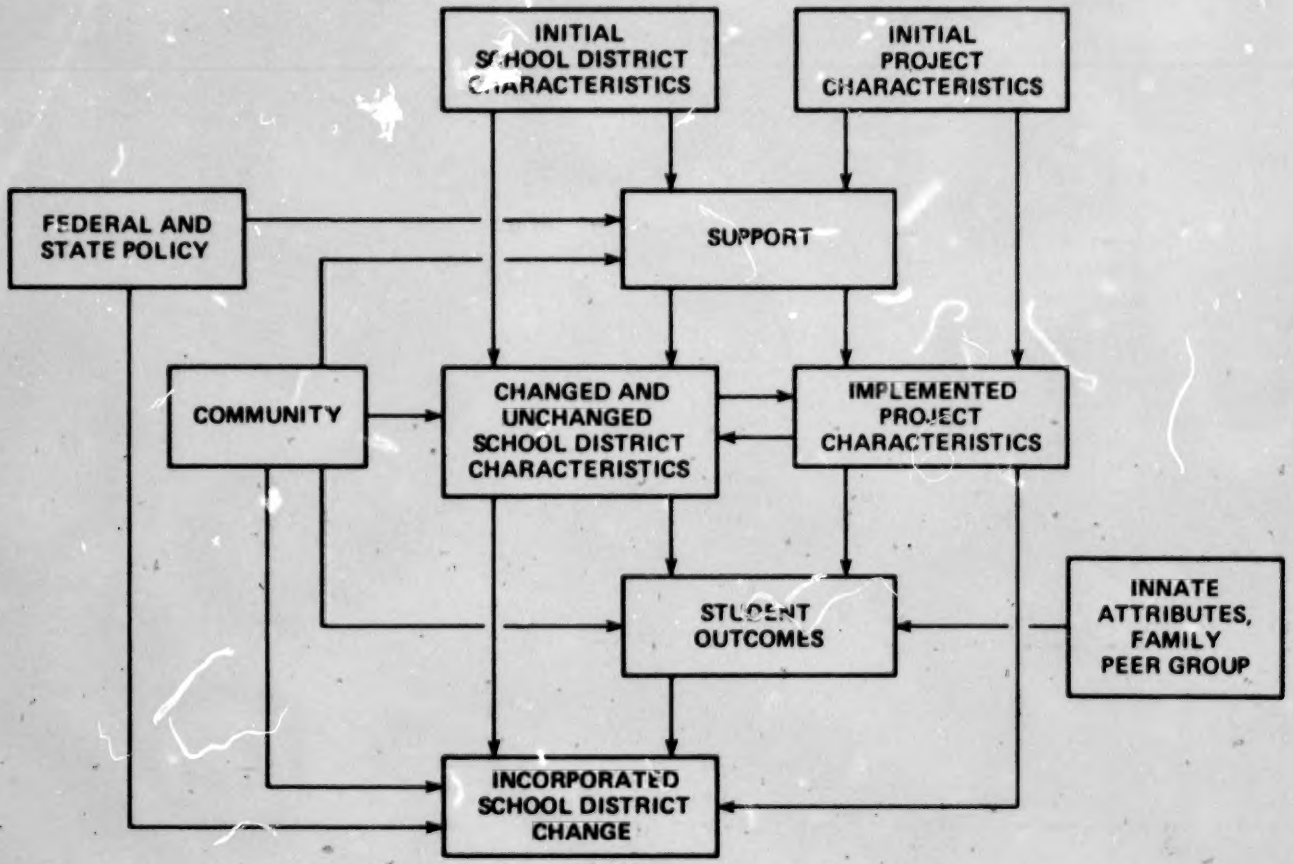
The second assumption established a need for a logical framework within which potential factors affecting impact could be identified. A conceptual model developed by Berman et al., (1974) was used to identify many of the potential factors affecting impact in a local school district. This schematic diagram of the model, shown in Figure 3, illustrates the relationships between factors affecting the process of change in a local school district. The initial characteristics of the school district affect the level of support for the project, as well as changes that occur in the schools. The initial project characteristics also affect the amount of support for the project and the actual project characteristics that are implemented. Support for the project is partially determined by the federal and state policies and the attitude of the community toward the project. The changed and unchanged characteristics of the school district and the implemented project characteristics mutually affect each other as well as affecting student outcomes. Student outcomes, however, are also affected by the attitude in the community, the students' innate attributes, family and peer groups. All these interactions lead to the final stage, incorporated changes in the local school district.

Some of the potential factors affecting the impact of an Institute on a local school district and community were peculiar to one or more school districts and others were characteristic of the design of an Institute. The following list of potential factors affecting the impact of the Institutes on local school districts and communities were investigated:

1. Demographic and political characteristics of the community in which the local school district is located
2. Career education and guidance activities in a school district prior to the Institute
3. Federal and state policies toward career education and guidance
4. Organizational structure of a school district
5. Role of the local General Electric representative in securing a commitment from the local superintendent of schools to participate in the Institute
6. Process by which the local school district decided to participate in the Institute
7. Process for selecting team members
8. Attributes of the principal actors involved in both the pre-Institute planning phase and the Institute phase
9. Preparation and orientation of team members before the Institute
10. Stated and perceived objectives of the Institute
11. Team plan, including stated goals, objectives, techniques and strategies
12. Capacity of a local school district to make changes(innovate)
13. Communication of the team plan to local educators in a school district
14. Support for the plan by educators, administrators and community.

FIGURE 3

Factors Affecting Change and Their Relationship in a Local School District (Developed by Berman et al., 1974)



This list of potential factors affecting impact was not viewed as comprehensive, but provided a focus for identifying factors that did influence impact in each school district.

The third assumption was confirmed in an analysis of the literature. Berman et al. (1974) state: "It may be that change in local practice is both occurring at an incremental rate and is accumulating slowly across the system, and is thus overlooked because our present concepts of 'change' are not sufficiently discriminating." The impact of the Institute, then, may continue to unfold beyond the period of evaluation.

Figure 4, Overview of Logic Used in Developing Evaluation Study, summarizes the discussion in this section.

Identifying Potential Data

Efforts were made within the logic of the study to develop questions and sub-questions that might help describe the impact and factors and, at the same time, provide the interviewers with a framework for organizing data collected from interviews and documents. The questions were not intended for systematic use in each interview but were used as a guide to the case study to insure that all previously identified, potentially meaningful data were addressed in the interviews and discussions and recorded throughout the study.

Questions were designed to describe specific data pertaining to potential areas of impact, factors influencing impact and general data that could vary across districts. The potential areas of impact were not always mutually exclusive, since questions may be common to two or more areas such as curriculum activities and community involvement activities. Hence, redundancies occurred in data collected for different areas of impact, but a more detailed description of the interrelationships of the factors influencing the impact of the Institute was thus gained.

The list of questions for each potential area of impact and each potential factor influencing impact were organized in a schedule used to guide the on-site interviews and the reviews of documents. This schedule is presented in Appendix B. The questions and design for the study were submitted to the Foundation for reviews and suggestions prior to collecting the data for the study.

Selecting School Districts

Six school districts that participated in the 1976 or 1977 Institutes held at the University of South Carolina or Indiana University constituted the sample for this study.

The following two criteria were used to select school districts for this study.

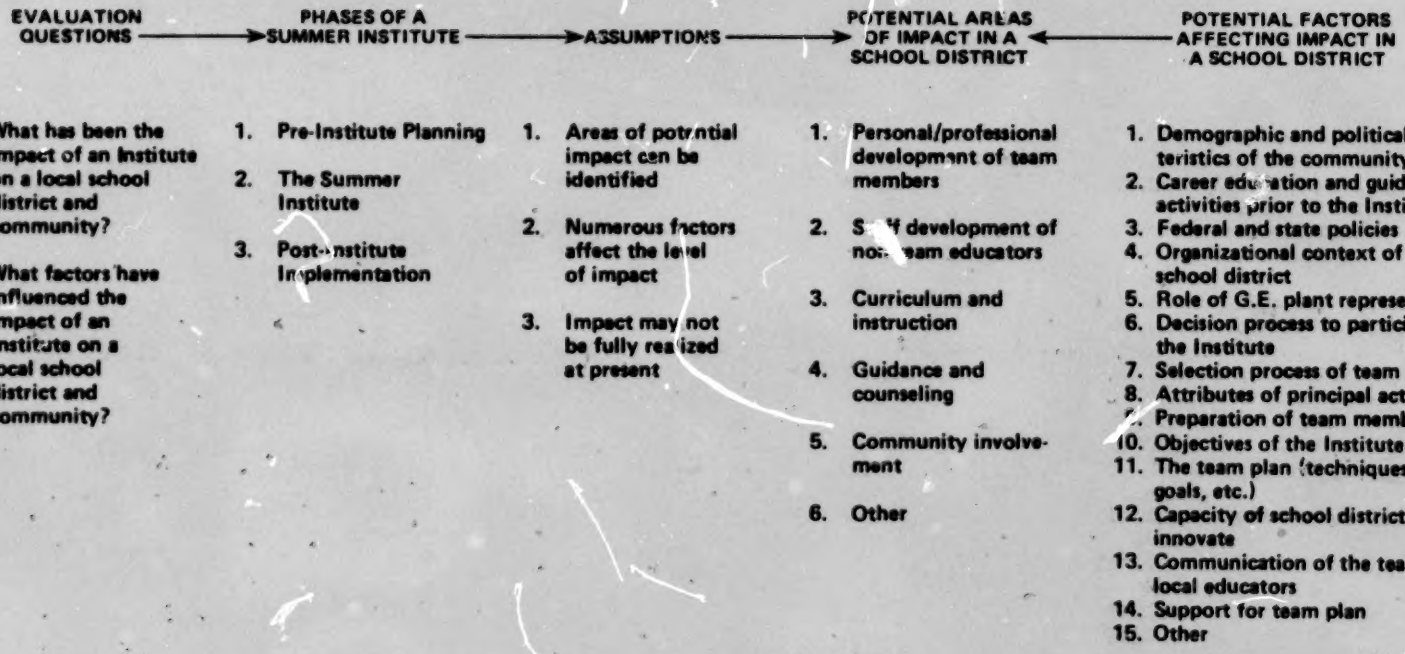
1. *The Composition of the Team:* Team composition was determined by the number of administrators, counselors and/or teachers included as team members. Any team consisting of one or more individuals from each category was assigned a numerical value of 3. A team of one or more individuals from any two categories (e.g., teachers and counselors) received a numerical value of 2. A team of individuals from only one category (e.g. counselors) received a numerical value of 1.

2. *Potential for Impact:* Upon request of the project staff, the participation of each district in the Institute was rated by the Institute directors as "good," "fair," or "poor" in the following categories: (1) potential of the team plan for impact, (2) post-Institute information on impact in the school district and (3) overall participation. A rating of "good" was assigned a numerical value of 3; a rating of "fair" was assigned a numerical value of 2; and a rating of "poor" was assigned a numerical value of 1. The three scores for each district were then averaged to obtain a final score.

The numerical scores for each criteria were totaled for each school district. A district with a total of 5 or 6 had a high composite rating. A district with a total of 3 or 4 had a low composite rating.

FIGURE 4

Overview of Logic Used in Developing Evaluation Study


EVALUATION QUESTIONS
PHASES OF A SUMMER INSTITUTE
ASSUMPTIONS
POTENTIAL AREAS OF IMPACT IN A SCHOOL DISTRICT
POTENTIAL FACTORS AFFECTING IMPACT IN A SCHOOL DISTRICT
1. What has been the impact of an Institute on a local school district and community?
2. What factors have influenced the impact of an Institute on a local school district and community?
1. Pre-Institute Planning
2. The Summer Institute
3. Post-Institute Implementation
1. Areas of potential impact can be identified
2. Numerous factors affect the level of impact
3. Impact may not be fully realized at present
1. Personal/professional development of team members
2. Staff development of non-team educators
3. Curriculum and instruction
4. Guidance and counseling
5. Community involvement
6. Other
1. Demographic and political characteristics of the community
2. Career education and guidance activities prior to the Institute
3. Federal and state policies
4. Organizational context of the school district
5. Role of G.E. plant representative
6. Decision process to participate in the Institute
7. Selection process of team members
8. Attributes of principal actors
9. Preparation of team members
10. Objectives of the Institute
11. The team plan (techniques, strategies, goals, etc.)
12. Capacity of school district to innovate
13. Communication of the team plan to local educators
14. Support for team plan
15. Other

In addition to the above criteria, three factors were considered in the selection of school districts:

1. *The Size of the School District:*

   a. large: more than 50,000 students
   b. medium: 20,000 to 50,000 students
   c. small: less than 20,000 students

2. *The Year of Participation in the Institute:* Participation in the 1976 or 1977 Institutes

3. *The Site of the Institute:* Participation in the Institute at the University of South Carolina or at Indiana University.

The ideal distribution of the sample would call for three school districts that had participated in the Institute at each of the two sites and during each of the two years. Two of the school districts would be large, two would be of medium size and two would be small. Within each size category, one district would have a high composite rating and one a low composite rating. This ideal distribution would have required twelve school districts but this was precluded by the proposal conditions for six schools and the limited resources.

The actual distribution of the six school districts selected for study with respect to the criteria and factors was as follows:

1. Four school districts participated in the Institutes held at the University of South Carolina, two in 1976 and two in 1977.

2. Two school districts participated in the Institutes held at Indiana University, both in 1977. (The imbalance of representation was due to lack of available information on the 1976 Institute at Indiana University.)

3. Two of the school districts were large, two were of medium size, and two were small.

4. For each of the two large, medium-sized, and small school districts, one had a high composite rating and one had a low composite rating.

After the sample of six school districts was selected and approved by Mr. William A. Orme, Secretary of the General Electric Foundation, Mr. Orme wrote to the superintendent of each school district requesting the districts to participate in the evaluation study and to identify a contact person for the project. (A copy of the letter is in Appendix C.) The project staff, upon receiving a positive response from the district and the designation of a contact person to serve as liaison to the study, wrote to the contact person, and further explained the study and the data to be collected through interviews and document reviews. (A copy of the letter to the contact persons is included in Appendix C.)

Selecting Persons to be Interviewed

The contact persons were asked to assist the evaluation team in identifying which individuals in the school district should be interviewed and in scheduling the interviews. Interviewees were selected from a wide range of personnel in the schools and community. The primary criterion was to select individuals who were believed to have information on the team's participation in the Institute or its activities after the Institute, particularly those related to implementation of the team plan. Not all interviewees were identified prior to the arrival of the evaluation team at the school district: some individuals were identified as potential sources of information during scheduled interviews of the evaluation team. The evaluation team then added these additional individuals to the interview schedule. A total of 162 persons were interviewed across the six school districts. The interviewees included:

1. All the team members in the school district

2. Non-team teachers and counselors in each of the school buildings where team members were located

3. The principals of the school buildings where team members were located

4. The superintendent of the school district, the director of instruction, the career education coordinator and/or the guidance coordinator

5. The local General Electric representative who initially contacted the school district to solicit participation in the Institute

6. Others, such as board of education members, business and community leaders, parents and students.

Collecting and Analyzing Data

The major activities in collecting and analyzing the data consisted of (1) preparing a manual to guide the collection of data, (2) reviewing documents, (3) interviewing team members and other individuals involved in the implementation of the team plan, (4) recording interview notes and (5) analyzing the data.

Data Collection Manual

A data collection manual was developed by the project staff to assure that quality and consistent data were collected from the documents reviewed and persons interviewed and recorded in a manner that could be easily retrieved and analyzed. The manual consisted of:

1. A master list of documents to be reviewed at each site

2. The list of questions and sub-questions that described the types of data to be collected for each potential area of impact and the potential factors influencing impact

3. A key/code word list of the questions and sub-questions used by the interviewers to check off points as they were covered in the interview

4. A master key/code word list of the questions and sub-questions used by the interviewers to code data obtained from documents or interviews.

Document Reviews

Documents that were perceived to be related to the potential areas of impact and potential factors influencing impact were reviewed either in advance of site visits or during site visits. The documents that were reviewed in advance of the site visits included:

1. The needs assessment developed by the team members from some of the school districts prior to participation in the Institute

2. The team plan developed at the Institute

3. Annual community progress reports that contain background and demographic information on the school district (e.g., the type that is shared with citizens of the community)

4. Evaluation reports of career education and guidance programs (e.g. follow-up reports to the Institute directors).

The project staff requested each school district to supply these documents in advance of the site visit. These documents were reviewed and all relevant data were recorded for project and interview purposes. This process helped to provide the project staff with an understanding of the context and of many aspects of the career education programs that were addressed in the interviews.

Two of the school districts did not have a documented needs assessment, one school district had not prepared annual progress reports, and two had no evaluation reports of their career education and guidance projects/activities.

Documents that were reviewed during the site visits included:

1. Directories of community resources
2. Staff resource materials
3. Correspondence related to the Institute or team plan
4. Board-approved documents referencing the team plan (e.g., resolutions, position statements, minutes of meeting)
5. Other important documents and memoranda related to career education programs and activities in the school district.

These documents were reviewed in order to verify data obtained during interviews. Documents that had not been previously identified and obtained by the interviewers were sometimes mentioned by interviewees. Review copies were obtained whenever possible and used to provide more complete data on the impact of the Institute.

Interviewing Persons

Interviews ranged from twenty to forty-five minutes in length. Teachers and counselors with minimal involvement in the implementation of the team plan were interviewed for only twenty minutes. Forty-five minute interviews were used for team members and administrators in the school district. In most instances interviews consisted of one interviewer and one interviewee.

The basic approach of the evaluation team was to inform the interviewee of the objectives of the study and to ask them to tell the interviewers about the Institute and the influence the Institute had in the local school district. The conversation was deliberately unstructured in order to minimize the effect of the presence of the interviewer and implications of specific and leading questions.

The interviews followed elite interviewing techniques as described by Dexter (1960) and naturalistic inquiry methodologies expounded by Guba (1977). These techniques include stressing the interviewee's definition of the situation, encouraging the interviewee to structure the account of the situation and letting the interviewee introduce to a considerable extent what he/she regards as relevant instead of relying upon the interviewer's notion of relevance. Using these techniques, the interviewer lets the interviewee define the problem, the question, and the situation.

Recording Interview Data

Recording the data involved four basic steps. ***Step one*** consisted of taking notes during the interview and reviewing the documents. ***Step two*** consisted of writing a narrative description of all data collected during the interviews and document reviews. Care was taken that the writing of statements could be fully accomplished at the end of each day so that the interviewer's memory of the conversation and meaning of the notes taken during an interview would be clear. ***Step three*** consisted of coding the narrative statements. The master key/code word list was used to accomplish this task. For each of the questions developed for a potential area of impact or potential factor influencing impact, an alpha and numeric code was matched with a key descriptive word or phrase from each question. Each narrative statement was assigned the appropriate alpha and numeric code. ***Step four*** consisted of the subsequent typing of the written statements on coded index cards. Data for a single code was placed on one card, or a series of cards, if more than one card were required. In the event that a data item related to more than one code, a separate card or series of cards were typed for each additional code and were coded separately.

Analyzing Data

The analysis of the data was a two-step process. ***Step one*** focused on the analysis of data for specific questions of the potential areas of impact and potential factors influencing this impact in each of the six school districts. This approach provided a full description of the impact of the Institute in each of the school districts and the principal factors influencing this impact. The approach taken in ***step two*** emphasized a comparative treatment of the impact of the Institute and the principal factors influencing this impact across the six school districts. This approach provided an overall picture of the impact of the Institute and of the factors that facilitated or limited this impact common to several school districts.

Pilot Test

The procedures for data collection and analysis were pilot tested in a local school district and revised as needed. A report of the pilot test was prepared and submitted to the Foundation for review. Suggestions were made to project staff and used in the preparation of this report.

Limitations of the Study

The limitations of the study are related to the use of the case study methodology on an innovative training program and to the sample and scope of the study. Corwin (1973) identified seven limitations in the use of case study methodology in similar studies, and Kester et al., (1975) elaborated on the limitations. Six of these limitations applied to this study.

1. *Multiple and Ambiguous Objectives.* In many cases, the objectives of innovative programs are stated ambiguously in order to take into account the diverse settings in which the program will be implemented. Also, program directors often find it strategically wise to intentionally state objectives ambiguously so that neither the success nor the failure of the program can be judged according to any single set of criteria. In this study, Institute objectives were both multiple and ambiguous.

2. *The Critierion Problem.* It is difficult to identify the specific changes in behavior that are expected of participants involved in the implementation of programs with multiple objectives. Also, it is difficult to know whether a program has been successful when expectations have not been clearly defined. Both difficulties apply to this study.

3. *The Measurement Problem.* Critical measurement problems include separating the effects of the program being studied from other sources of change and identifying changes of character that occur in participants due to involvement in the program. The state of the art in the measurement of such variables is still primitive and generally, researchers must develop their own instruments. In this study, the project staff developed its own set of questions and sub-questions.

4. *Heterogeneous and Evolving Nature of Career Education.* Career education is contunually evolving. A wide variety of options is available for including career education activities into curricula and guidance programs. Teachers, counselors and administrators exhibit a great variety of attitudes toward career education in theory and in practice. The progress of career education may be encouraged or limited by the actions of local colleagues and supervisors, state and university personnel and software suppliers. All of these factors make it difficult to sort out accurately the intervening variables that contribute to the expansion of career education within a district.

5. *Complexities of Social Relationships.* Relationships among individuals in a school setting can be very complicated. Previous experiences, current situations and plans for the future are in a continuous state of change and affect attitudes toward individuals and the acceptance of suggestions and requests. Individuals may be reluctant to give credit to another person for an idea or practice in career education, particiularly if the development and execution of the idea held rewards for those persons. These and other social phenomena made the evaluation difficult in this study and may have limited or biased the data. However, data was cross-checked among interviewees and with documents in an attempt to sort out these biases.

6. *Charismatic Effects.* Often, programs are initiated by individuals who have great confidence in and enthusiasm for these programs. Therefore, the leadership abilities, chrisma, or ability to "sell" the innovation, regardless of its worth, is a major variable in the implementation process. In this study, attempts were made to take such factors into account, but this variable is difficult to measure.

Limitations associated with the sample and scope of the study were

1. The sample did not include an equal number of school districts from Institutes conducted by the University of South Carolina and Indiana University

2. The study considered only the impact to date. The future impact of the Institute within a district could not be estimated.

3. The sample represented schools that had participated in Institutes offered in only two years of the approximately ten years in which Institutes have been conducted as prescribed by the Foundation. The range of possible impacts may not have been represented in the six schools selected.

4. Measured impact of the Institutes on students was not investigated due to limited schedule and resources of the study.

These limitations do not detract from the findings of this case study but are provided to aid in understanding the factors at play in the conduct of the study.

FINDINGS

The findings reported in this section are by district and include background on the district, a summary of the findings, pre-Institute factors associated with the district's participation in the Institute, the areas of impact, post-Institute factors influencing impact, and suggestions by interviewees for improving the Institute. The school districts, other agencies, and individuals who participated in the evaluation study are not identified, as was approved by the sponsor and promised to all participants. School districts are referred to in the study as Districts A, B, C, D, E, and F. Individuals are referred to as a team member, non-team faculty, or their position title.

Extenuating Circumstances

The findings are described in terms of the impact of the Institutes. It should be noted here that there were a number of circumstances beyond the control of the Institutes which affected the success of the Institutes. The extenuating circumstances identified were as follows:

1. Time of contract approval for Institutes precluded early pre-Institute visits by directors to prospective schools in December and January when directors had time available for travel to the schools.

2. Late cancellation of school districts caused substitute teams to be ill-prepared for successful participation in the Institute or the Institute to be missing one or two teams.

3. Most schools had difficulty identifying five persons who were available to attend the Institute. Selection was often determined by availability, not need.

4. Most school districts had difficulty maintaining the original selected team members due to late, changing personal circumstances. Substitutes had to be found at the last minute. These persons often lacked personal and professional preparation to participate.

5. Curricula resource materials provided for use by participants were largely borrowed, sometimes outdated, and too theoretical.

6. Static budget levels for Institutes have not allowed for inflation. There have been reductions in travel and selected living conveniences for participants.

School District A

Background

School District A is located in a city with a population of 80,000 and a diverse socioeconomic composition. Approximately 16,000 students were enrolled in this district in the 1978-79 school year, 7,500 of whom were enrolled in the secondary schools. The racial composition of the student body was 65 percent white, 32 percent black and 4 percent Hispanic and other non-black minorities. The student-teacher ratio averaged 25 to 1 across the system. The average per pupil expenditure for the 1977-78 school year was $1,039.

This school district and the state education agency have placed a strong emphasis on vocational education in comprehensive high schools. The career education emphasis is relatively new to this school district and throughout the state. In 1976, state policies and guidelines required school districts to emphasize career education in their curriculum. However, neither the

state educational agency nor the local education agency has provided funds to the school district to develop career education programs. Grants of $1,500 to elementary teachers for classroom resources and field trips and $400 to junior high school teachers for classroom resource materials and speakers were received once from an area agency near the school. The school board president and superintendent voiced support for career education but stated that it was not a high priority of the district. Other priorities given major attention in the school district were the transition to middle schools and the development of a guidance plan.

Career education programs and activities offered prior to the Institute were described by interviewees as uncoordinated and left to the initiative of each teacher, some of whom made occasional efforts. The overall attitude in the district toward career education prior to the Institute was described by a district administrator as negative because the philosophy of career education was being forced on the local educators from the national and state education agencies. In general, most of the career orientation programs and activities were seen as the responsibility of the vocational teachers in the district.

Summary

The Institute was reported by interviewees to have had a high impact on School District A. The Institute was instrumental in promoting the personal and professional development of team members in a variety of areas, stimulating and motivating some individuals to infuse career education into the curriculum in the five secondary schools used to pilot the team plan, developing new career education programs and activities in the five pilot schools and increasing the awareness and understanding of career education among the faculty throughout the entire district. Many of the strategies and activities included in the team plan were implemented in this district. Among the many factors that facilitated the high impact of the Institute in this school district were the professional role and initiatives of the team members, strong support of the team's initiatives and team plan by key district administrators and the principals of the pilot schools, and the emphasis on the development of career education programs by the state education office.

Pre-Institute Factors

The superintendent of the school district received a letter and brochure explaining the Institute about six months before the Institute. The letter offered the opportunity for a team from this district to participate in the Institute. The superintendent and other district administrators decided that this would be an excellent opportunity for some of the guidance counselors in the school district to develop their knowledge of career education.

A district administrator met with all secondary principals and discussed the letter of invitation from the Institute director. The principals were asked to tell staff members interested in participating to contact this district administrator. The response was good and all five team members were selected in this manner. Team members were recruited in February and March. The primary criteria for selecting team members were interest in career education and availability during the summer. The team consisted of one principal, two counselors and one teacher from four junior high schools and one counselor from a senior high school. Beyond interest and availability, other important factors influencing staff members' decisions to participate were (1) college credit that fulfilled the school's professional growth requirement, (2) paid tuition and (3) the support of the administrator in charge of recruitment.

The team met twice prior to the Institute. The first meeting was held in March with the district administrator to plan the goals they would include in their team plan. They agreed to use the five schools in which they were based to pilot the infusion of career education into basic curricula. The Institute director also met with the team for one hour to present a filmstrip on the Institute. The team members and district administrator stated that they had adequate written information on the purpose and focus of the Institute, but no information on the schedule, housing accommodations, address and phone number of housing. These logistical details had to be confirmed by phone two weeks before the Institute. Other preparations by the team included gathering materials on career education from other school districts and arranging to take a typewriter and tape recorder to the Institute.

Areas of Impact

All team members stated that the Institute was a worthwhile and personally beneficial experience. During interviews team members testified to the following personal gains:

1. An increased awareness of the role of business and industry
2. An increased knowledge of training programs in business and industry and of the availability of resource people in business and industry to the local schools
3. A greater awareness of career education and a practical approach to career education
4. Increased self-esteem and interpersonal skills.

Perceptions of the team members of the value of the Institute compared to other in-service experiences are reported in Table 1. The rankings of each team member and a team average are shown. The rankings are on a quartile basis.

Table 1

Value of Institute Compared to Other In-service Experiences of Team Members from School District A

Team Members	Quartile Scale			
A	1	2	3	(4)
B	1	2	3	(4)
C	1	2	(3)	4
D	1	2	3	(4)
E	1	2	3	(4)
Average Ranking	3.8			

These personal/professional gains were demonstrated by the enthusiasm exhibited by the team members for career education and the role these individuals played in implementing the team plan in their respective schools.

Team members attributed these personal gains to the personal interaction with their fellow team members and participants from other schools that resulted in the sharing of ideas and perspectives, to the shadowing experiences and contacts with business and industry personnel at the Institutes and to the availability of many resource people and materials at the Institute. This testimony was confirmed by school principals and district administrators who had a great deal of interaction with the team members after the Institute. One administrator stated that the most helpful aspects of the Institute in promoting personal development were (1) the social acceptance of and interaction with staff from other schools, (2) the comradery that developed among the team members and (3) the visits and shadowing experiences in industry.

The goals of the team plan were

1. To initiate and generate interest in career education and to gain commitment for a secondary career education program in the school district
2. To develop an integrated and sequential career awareness, exploration and preparation program for grades 7-12 that will be coordinated with the existing career education curriculum for grades K-6.

The team plan also included background on the school district and on the philosophy and theory of career education, a tentative calendar of activities to be carried out during the first year following the Institute, and a general explanation of the format for planned in-service training.

After returning to the local school district the team had a meeting with the district administrators and the principals of their respective schools to share their experiences at the Institute and to present their team plan. The team members stated that they received much support at this time and were given approval to hold in-service meetings and to use their five schools to pilot the plan.

The team members held three half-day in-service meetings for teachers in the district during an in-service week in August preceeding the opening of school. Approximately 160 secondary teachers and counselors (50 percent of the secondary staff) attended these in-service meetings. The in-service meetings focused on the philosophy and theory of career education and on an explanation of the plan developed at the Institute. Team members also conducted separate training sessions for all teachers in their respective schools. These sessions focused primarily on implementation of the team plan. In addition, an article in the faculty newsletter briefly described the team's experiences at the Institute and the team plan.

In their respective schools, team members formed career education implementation committees composed of seven to fourteen teachers. This committee was to oversee the infusion of career education into all curricula. The committee had the responsibility to help develop career education activities that could be used in each subject area.

In four of the pilot schools, an advisory committee consisting of teachers, parents and personnel from local businesses was formed. The primary functions of this committee were to involve the community in such career education activities as providing resource people to classroom teachers and helping to determine the employment needs of the community.

A brief description of career education activities initiated by team members in each of the pilot schools follows:

1. One of the pilot junior high schools was represented at the Institute by the guidance counselor who also served as coordinator of instruction. The counselor received the full support of the principal for all career education programs and activities. These activities included compiling a record of career education activities used in the classroom and providing guidance to teachers in conducting activities. The counselor testified that the resource notebook obtained at the Institute aided in developing many of these activities. The teachers in this school were required to have at least one career education activity every six weeks. The advisory committee in this school organized a file of individuals and corporations that could be called on for tours, demonstrations, and speakers. Few teachers used this resource.

2. The team member in another pilot junior high school was a vocational teacher who expressed a strong commitment to career education. This team member stated that problems in implementing the team plan in this school arose because (1) other teachers were resistant to the plan and perceived it as additional work, (2) this vocational teacher had no authority over other classroom teachers and (3) the principal and guidance counselor gave minimal support to the plan. The guidance counselor in this school voiced support of career education but did not support its inclusion in the curriculum. The team member had formed an advisory committee of seven individuals from the school and community. The committee had compiled a composite list of speakers from local businesses for the use of classroom teachers. Although not many speakers had been called, it was anticipated that more would be used nearer to the end of the school year.

3. The team member from the third pilot junior high school was the principal. The principal used the services of the counselor in this school to implement the curriculum infusion plan. A curriculum guide for career education was developed in conjunction with fourteen teachers, representing each of the subject areas of the school. The activities were piloted in the classrooms. The team member also formed an advisory committee in this school. The advisory committee organized a Career Day involving 51 speakers from local business and industry. All 650 students in this school attended five presentations of their choice.

4. The team member from the pilot high school was the guidance counselor. The counselor functioned independently in the school and received strong support from the principal for all career education activities. The team member assisted teachers and other counselors in planning career education activities for the classroom and providing resource materials in career education. The career education implementation committee required all teachers in the school to write summaries of their career education activities each term. The principal of this school stated that career education activities had been instituted in a few classes and that other classes would follow. He also stated that guidance counselors have developed a strong emphasis on career planning, due primarily to the team member's influence. This team member received $2000 in CETA funds to purchase career education materials and ordered some of the resource materials that were presented at the Institute.

5. The team member from the fourth pilot junior high school was its guidance counselor. This counselor was expected to occupy the traditional counselor role in this school and did not operate independently. This school did not accept the plan and the majority of teachers continued to be subject oriented. A career education implementation committee was formed in this school but the members were concerned only with their own subject areas. The team member has brought new career education materials, including curriculum units, into the school but these materials have been used minimally. The major role of the team member in this school was to provide encouragement and resources to those teachers already interested in career education. The impact of the Institute in this school was low.

Post-Institute Factors

The factors that had a positive influence on the impact of the Institute on the district were

1. Strong support of the team's initiatives and plan from key district-level administrators
2. Availability of a completed team plan for implementation in the school district
3. High visibility of the team and the plan through in-service sessions and the faculty newsletter
4. Strong support from principals in those pilot schools where the impact was high
5. Professional roles and personal initiative of the team members.

The factors that had a negative influence on the impact of the Institute on the district were

1. High priority in the pilot schools and throughout the district for the transition to middle schools
2. Lack of support from the principal in the pilot school with low impact
3. Low professional role of the teacher on the team compared to administrative staff and counselors
4. Lack of funding for career education by the state or local education agencies.

Suggestions for Improving the Institute

Many of the interviewees in School District A made suggestions for improving the Institutes. These suggestions were

1. Maximize the sharing of innovations and projects from other schools either during the Institute or on a regional basis after the Institute.
2. Supply packets of specific resource materials that the teams could disseminate to counselors and classroom teachers in their school districts.

3. Assist districts in gaining publicity on the team's participation in the Institute.

4. Enable follow-up representatives from each team to return to the Institute for one week during the following summer to report accomplishments and work out solutions to problems that arose in the implementation process.

5. Send a second team from the same school district to the Institute for two weeks during the following summer to work out practical problems that arose during the first year of implementation.

6. Hold a local or regional Institute utilizing the local General Electric plant facilities and expertise at local universities.

7. Shorten the Institute to three or four weeks. The current schedule was too demanding, given the nature of the Institute.

8. Structure the Institute so that consultants are available when needed.

School District B

Background

School District B is located in a rural area. The socioeconomic level of the population is primarily lower class and lower middle class. The school district's enrollment for the 1978-79 school year was approximately 10,000 students. The racial composition of the school district was 67 percent white, 32 percent black and 1 percent other. The school's statistical records for 1978 showed that approximately 50 percent of the high school graduates from this district entered postsecondary education programs and another 40 percent were employed full-time while enrolled in vocational or trade schools. The per pupil expenditure for the 1977-78 school year was $901. The student-teacher ratio across the district was 22 to 1. There has been no federal or state funding for career education programs and activities in this district.

This school district has been experiencing fiscal problems for several years due to inflation and the annexation of one-third of the county's tax base to an adjacent city. Administrators stated that this problem had necessitated limiting funding for new programs and activities. However, through federal and state funding a new county vocational and technical school was opened during the year in which the team from this school district participated in the Institute. The vocational education programs were the top priority of the district at this time. Career education was not a priority in the district and when the team returned to the district, all career education activities were placed under the supervision of the director of vocational education.

Before the team participated in the Institute, there was little interest in career education at all levels in the district. Career education was seen as a function of the vocational education teachers. Any career education activities that occurred were due totally to the interest and initiative of individual teachers or counselors.

Summary

The Institute was reported by interviewees to have had a low impact in School District B. The Institute was instrumental in promoting the personal and professional development of team members in a variety of areas. The team plan developed at the Institute was not implemented in this district. One of the team members did initiate career education activities in several classes in one school and some material identified at the Institute had been purchased by this school. Among the many factors that limited the impact of the Institute in this school district were the lack of support for the plan at all levels in the district, the loss of two of the three team members by the school district, and the ambitiousness of the team plan to implement from conception a K-12 program of career education with no previous support for career education.

Pre-Institute Factors

This school district was contacted to participate in the Institute in late April, six weeks before the Institute was to begin. The initial contact was made with the superintendent by an individual from the local General Electric plant who was also a member of the district's school board. This contact did not occur until April since the local General Electric plant had originally contacted an adjacent school district that accepted the invitation to the Institute and then cancelled late in April. In May, individuals from the local General Electric plant met with the entire central administration staff to explain the Institute and solicit their participation. The presentation included information on the objectives, accommodations and the duration of the Institute. The central administration decided to participate if a team could be assembled before the start of the Institute.

Letters were sent to all principals requesting them to suggest any guidance personnel who would be interested in the Institute, but these received little response. The Institute director visited the school district in mid-May and only one individual had decided to participate at this time. The Institute director met with all guidance personnel in the district to explain the Institute more fully and to gather some background data on the school district. At this time four other guidance personnel decided to participate; however, two of these individuals dropped out a week later. The actual team consisted of two secondary and one elementary school guidance counselors.

The three team members met once prior to the Institute. They did not set any specific goals but went to the Institute with the general goal of planning a program for career education that would be implemented in the district.

The team members who were interviewed gave personal reasons on why they participated in the Institute. One team member wanted to gain expertise in career education and guidance. This member had no interest in the graduate credits received. The other team member participated at the request of a supervisor.

Areas of Impact

Only one team member remained in the school system, but it was possible also to interview one other who had taken a position in an adjacent school district. The team member not interviewed had become seriously ill and stopped working altogether. The team members who were interviewed praised the Institute highly and felt that it was very worthwhile both personally and professionally. Specifically, the team members testified to the following personal gains:

1. Increased knowledge of the world of work and the education necessary for specific careers
2. Increased awareness of the role of business and industry and an increased knowledge of training programs available in business and industry
3. Increased knowledge of techniques for classroom instruction and guidance in career education and of ways to implement career education programs in the school district
4. New perspectives on career education
5. Additional knowledge of the many resource materials and resource people available to local school districts
6. Increased self-confidence and interpersonal skills.

The two team members attributed these personal gains to (1) the sharing of ideas and perspectives with other participants at the Institute, (2) the shadowing experiences and (3) the speakers from business and industry.

Perceptions of the team members of the value of the Institute compared to other in-service experiences are reported in Table 2. The rankings of each team member and a team average are shown. The rankings are on a quartile basis.

Table 2

Value of Institute Compared to Other In-service Experiences of Team Members from School District B

Team Members	Quartile Scale
A	1 2 3 (4)
B	1 2 3 (4)
Average Ranking	4.0

Non-team educators in the district and administrators who had contact with the three team members when they returned from the Institute testified that the team members were very enthusiastic about the plan they developed at the Institute and were willing to work extremely hard to implement the plan.

The goals of the team plan were

1. The development of a nucleus team to organize orientation workshops for a thirty member Career Education Leadership Laboratory
2. The introduction of career education units in pilot test classes at each school
3. The infusion of career education units into the total curricula during the 1978-79 school year.

The team plan also included background on the philosophy and theory of career education, recommendations on the composition of each of the groups to be formed and the responsibilities and functions of each and outlines for in-service activities to be held throughout the year.

The team presented the plan to the superintendent and other central administrators on return from the Institute. One team member stated that the administrators did not support the plan since they felt it was not feasible and that it conflicted with some of their own goals. Another team member further testified that selected district administrators had previously assured that the plan would have complete support. This team member stated that the team was in constant contact with the district administration while at the Institute and was under the impression that it would get full support upon returning to the school district. One district administrator stated that the team plan was overwhelming and that when the team members met the realities of budget and other limitations, they were disappointed.

Without the support of the administration, the team member remaining in the district attempted to organize a workshop for interested teachers and counselors from each of the thirty schools in the district. This team member sent letters to all the principals in the district requesting them to announce this workshop to their faculty. She stated that no action was taken until she contacted the principals by phone. Fifteen individuals then responded and a workshop was held explaining the general philosophy of career education and the team plan. Both team members stated that after this workshop no other aspects of the plan were implemented due to lack of support at all levels. An administrator testified that some guidance personnel in the district have adopted the career approach of the workshop and the career orientation of the team member.

Some unintended outcomes of the team's participation in the Institute were

1. Career education resource materials identified at the Institute were purchased

2. Public relations activities were conducted with parents to arouse interest in career education to create demand for career education in the district

3. Career education programs were introduced in English classes in one school as a pilot project.

Post-Institute Factors

The major factors that had a negative influence on the impact of the Institute in this school district were

1. Failure of two of the three team members to remain in the school system after participating in the Institute

2. Lack of support for the plan at all levels in the district

3. Lack of funding necessary for the implementation of the team plan

4. Low priority of career education in the district

5. Unrealistic scope of the plan.

Suggestions for Improving the Institute

The interviewees in School District B made suggestions for improving the Institute. These suggestions were

1. Attempt to address participants at a proper level. Evaluate the expertise of the teams and plan presentations accordingly.

2. Allow more pre-Institute preparation time. Contact the local General Electric plants eighteen months prior to the Institute. Select teams and alternates one year in advance. Early contact would facilitate the identification of district needs, the devleopment of team goals, the composition of the team, and future district funding for career education.

3. Decrease emphasis on career education theory and increase emphasis on the practical aspects and activities of career education implementation. Utilize consultants and speakers who have been involved in implementing career education in public schools.

4. Research the background of a school district more fully before investing in that district.

5. Make more time available during the day for teams to work on their plans.

6. Stipulate that teams include a district administrator in order to provide a practical perspective and to help determine possible stumbling blocks that should be considered when developing a plan.

7. Supplement team members' salaries to compensate for the choice to participate in Institute over summer employment. Perhaps supply team members with employment at the local General Electric plant when they return.

8. Reinforce teams immediately upon return to the school district. Provide follow-up technical assistance to the team throughout the year.

School District C

Background

School District C is located in a rapidly growing city with a population of 100,000. The socioeconomic composition of this community is diverse and includes urban, suburban, and rural groups. Enrollment in this school district for the 1978-79 school year was 26,200. The school statistical report for 1978 shows that 61 percent of the 1978 high school graduates enrolled in postsecondary education programs, 5 percent of these graduates entered technical and trade schools and another 6 percent entered apprenticeship programs. Twenty-seven percent obtained full-time positions in business and industry and 5 percent entered military service. District expenditures averaged $1,200 per pupil. The student-teacher ratio was 20 to 1. The position of career education coordinator was established in 1976 and eliminated in 1978. This school district received no federal or state funding for career education programs and activities.

Before the team participated in the Institute, career education had become a high priority in the district. Interviewees stated that the school board and central administration were very interested in career education and supported any programs relating to career education. The position of career education coordinator was established and the principals and teachers were beginning to become involved and to take an interest in career education. The guidance personnel in each of the schools were in charge of the career education programs and were working to infuse career education into all curricula and areas of instruction. Many of the guidance counselors and some classroom teachers had participated in the Educators-in-Industry program at the local General Electric plant during the three years preceeding this school's involvement with the Institute. Interviewees stated that the Educators-in-Industry program had generated widespread support for career education throughout the district.

Summary

The Institute was reported by interviewees to have had little impact on the programs in School District C. Although the team had fulfilled its goal of developing a section of the guidance handbook for their district, all team members stated that they were very disappointed in the Institute and no credit could be attributed to the Institute for any career education and guidance programs that have been implemented in the district. The primary factors limiting the impact of the Institute in this district were the high expectations of the team members and the precise goal they brought with them.

Pre-Institute Factors

The local General Electric plant was contacted by the Institute director in January concerning the possibility that a local school district could participate in the Institute. The local representative then contacted the director of guidance in School District C. An interviewee reported that the information about the Institute shared at that time indicated that the Institute would provide in-depth training in career education and its philosophy, shadowing experiences and the development of a team plan to be implemented in the local school district.

A district administrator stated that the central staff at the school had planned a four-to-six week workshop for guidance counselors during the upcoming summer to further develop their draft of the guidance handbook and to develop career education units for infusion into curriculum. When the school district was offered the invitation to participate in the Institute, the central staff saw this as an excellent opportunity to complete the guidance handbook with the aid of the expertise that was offered at the Institute. The guidance handbook, which had been under development for ten months, was in rough draft form prior to the Institute.

The director of guidance selected the Institute team members on the basis of their interest in career education and their role in the development of the guidance handbook. The selection process started in late February. This administrator stated that factors that prevented some staff from agreeing to participate were previous commitments and the length of the Institute. Originally, five team members and two alternates were selected but four days before the start of the Institute one team member cancelled and the alternates could not attend. A substitute was

enlisted to provide a five person team for the district. The team consisted of one district administrator, a principal, a counselor, a teacher from the secondary level, and an elementary learning specialist. Team members gave the following reasons for participating in the Institute:

1. Development of the guidance handbook
2. Personal and professional development
3. Previous participation in the Educator-in-Industry program
4. College credit
5. Summer salary from the district.

Vitae and goal statements of each team member were submitted to the Institute director in April. The team members were described by one administrator as top-notch people. All were leaders among their peers and were very active in guidance. All team members had master's degrees and graduate course work in career education.

The team members stated that they received a brochure in February explaining the schedule and goals of the Institute. The team met with the director of the Institute in late April to discuss further the goals and objectives of the Institute and to provide the director with background information on the district and on the personal goals of the participants. Several of the team members stated that they were very impressed with the Institute director at this meeting and very enthusiastic about participating in the Institute. The team members testified to the following expectations of the Institute:

1. In-depth coursework in career education and guidance
2. Availability of consultants to help each team develop a plan individually tailored to its school district
3. Personal and professional growth.

The team met twice after the meeting with the Institute director and prior to the Institute to develop team cohesiveness and to work on specific goals for guidance handbook.

Areas of Impact

The four team members who were interviewed made the following statements about the Institute:

1. "It was a negative learning experience. I gained nothing positive from participating in the Institute."
2. "The Institute didn't give me anything I couldn't have gotten on my own. It was a waste of my time."
3. "I gained nothing personally or professionally from the Institute."
4. "Participating in the Institute taught me a lot about myself as an educator because it was such a great negative learning experience."

Perceptions of the team members of the value of the Institute compared to other in-service experiences are reported in Table 3. The rankings of each team member and a team average are shown. The rankings are on a quartile basis.

Table 3

Value of Institute Compared to Other In-service Experiences of Team Members from School District C

Team Members	Quartile Scale
A	(1) 2 3 4
B	(1) 2 3 4
C	(1) 2 3 4
D	(1) 2 3 4
Average Ranking	1.0

Other educators who work closely with these individuals stated that team members have not discussed the Institute since they returned.

The goal of the team was to develop a *second section* of the guidance handbook, a handbook that contained the philosophy of the guidance services of the school district, a description of the six guidance services, objectives and activities for each service, strategies for producing the final product and strategies for implementing the objectives and activities in the handbook.

Team members testified that they had finished the second section of the handbook while at the Institute. All team members reported that the Institute in no way helped to develop the guidance handbook. They stated that the sessions, speakers, and presentations at the Institute were too basic, that consultants were not available when needed and were not helpful when available, that the resource materials at the Institute were outdated, that there was no flexibility in the schedule to accommodate differing team goals, levels of knowledge and practice of career education, that there was a strong conflict between the team and the Institute director concerning the management of the Institute and that their overall experience at the Institute was negative. Team members testified that informal discussion between the teams was the most beneficial aspect of the Institute. They felt that these interactions provided different perspectives and practical knowledge of implementation processes.

Interviewees stated that the guidance handbook was totally completed one year after their participation in the Institute. Several sessions with the district's secondary guidance staff and a workshop at a local university aided in refining the handbook and adding practical activities for implementation. The handbook has been distributed to all guidance personnel. One administrator stated that most of the strategies and activities were being implemented. One team member testified that the following results have been obtained due to the influence of the guidance handbook:

1. A teacher resource materials center with a career emphasis.
2. A library with a career emphasis in each school.
3. Cross subject coordination of career education activities and resources.
4. Placement coordination to help students gain employment.
5. New student assessment procedures.
6. An increased awareness of careers by students.

One unintended outcome of the team's participation in the Institute was the purchasing of career education materials for the school libraries and resource center. Several team members stated that they brought back a list of materials obtained from other teams at the Institute and that these materials were purchased by the schools.

Post-Institute Factors

The primary factors that had a negative influence on the impact of the Institute on the district were

1. Need to complete the writing of the team plan after the Institute
2. Low enthusiasm for the Institute limited the credit given the Institute.

Suggestions for Improving the Institute

Many of the interviewees in School District C made suggestions for improving the Institutes. These suggestions were

1. Determine the needs of the individual teams and structure activities accordingly instead of treating all teams and participants the same. Questionnaires could provide the Institute staff with information on individual team needs.
2. Utilize the special expertise of participants by grouping and cross-grouping team members for interactions. More practical viewpoints on how to implement programs and activities would then be available to participants.
3. Employ a less structured schedule so that teams may have time during the day to work on plans.
4. Offer choices on reading materials, field trips, and shadowing experiences instead of requiring every activity for all participants.
5. Provide time for review and discussion of shadowing experiences so that participants can share experiences and examine their implications.
6. Include more practical "how to" information for classroom activities and less "what is" information on the philosophy and theory of career education.
7. Update the resource materials provided by the Institute.
8. Prepare handouts on presentations and other resource materials for the teams.
9. Involve the local General Electric plant more fully in follow-up activities. The local Educators-in-Industry program could be more closely tied with the Institute so that some type of natural progression occurs.
10. Offer a local institute for all school districts in the area involving the local General Electric plants and universities. This could be for one week or more during the summer. The Institute would have a greater focus on the needs of the local communities and school districts. Involving more schools and businesses and industries in local school districts in planning the Institute and establishing and implementing career education would create linkages within school and the total community. A local Institute would be easier for participants to attend than the present central Institutes.

School District D

Background

School District D has a highly diverse socioeconomic composition and includes urban, suburban and rural groups. The school district's enrollment for the 1978-79 school year was 110,000 students. The racial composition of the district was 76 percent white and 24 percent black. Approximately 60 percent of the students were enrolled in vocational education courses. The student-teacher ratio was 28 to 1. The per pupil expenditures were $1,522. The district has received 1.3 million dollars in federal, state and CETA funds for career education over a four year

period. The career education funding from federal, state and CETA sources for the 1978-79 school year totaled $406,000. Merger of the city and county schools began in 1975 and involved desegregation and busing. The organizational structure of this school district is currently undergoing change with four regional administrative units to be established in 1980.

Prior to the Institute career education was a priority in the district. The commitment of the district to career education was evidenced by the number and role of career education staff, which included a district career education office with a staff of six full time professionals and a career education chairperson who is usually a teacher, in each of the 167 schools. These individuals provided

1. Workshops that met in-service training requirements for teachers
2. Demonstration lessons on infusing career education
3. Resource materials and people
4. Help in the organization of Career Days at individual schools
5. Assistance with bulletin board contest in the schools.

In addition, federal funding for career education has been used during the past four years to develop career education programs and activities in five "model" schools in the district. This school year all schools in the district were to infuse career education into the curricula.

Summary

The Institute was reported by interviewees to have had a low impact on School District D. The Institute was instrumental in promoting the personal and professional development of team members in a variety of areas. The team plan developed at the Institute was not implemented, but was used as a resource by the district's career education staff in the development of workshops for parents. Several of the team members also initiated activities involving community resource people in their classrooms. There were many factors that limited the impact of the Institute, including the lack of involvement of team members in implementing the plan and the lack of support for the team plan.

Pre-Institute Factors

A faculty member from a local university who was a member of the Institute staff contacted the director of career education in May to invite a team from this district to participate in the Institute. The director of career education made the decision at this time for the school district to participate.

Team selection began in May when the director of career education posted general information on the Institute on the staff bulletin boards in all of the model schools. In addition one member of the career education staff met with the faculty of several model schools to solicit team members. The response from the faculty in these schools was good and the director of career education selected six team members from the applicants. One team member canceled three days before the Institute but a substitute was found quickly. The team consisted of three secondary and three elementary school teachers. All team members were selected from model schools and had a strong interest in career education. Two of the team members had been used as career education workshop leaders prior to the Institute by the career education office. The information that team members had at this time was on the length of the Institute, number of graduate credits and financial arrangements. Team members stated that their primary reasons for participating in the Institute were (1) graduate-level college credit was offered and (2) all expenses were paid by the General Electric Foundation.

The team met as a group twice before the Institute. The first team meeting was with the director of career education and focused on the career education activities already underway in the district and on areas that needed to be developed. At this meeting the director of career education recommended that parent involvement be the focus and goal addressed by the team at

the Institute. Parent involvement in career education activities was a stated goal in a proposal to the United States Office of Education from the career education office in the district. One administrator stated that the career education office thought the Institute could be helpful in developing a parent involvement program for the district. Parent involvement has always been very low and less than 5 percent of the parents attend parent functions. All team members stated that the director of career education made it clear that the plan developed for parent involvement would be implemented by the career education staff and not be by the team members.

The second team meeting was held in late May with the Institute director. Team members stated that the director explained the Institute in general terms and that they still had little idea of what the programs and activities at the Institute would entail. Team members stated that they would have benefited from more specific information on classes, presentations, groups and other activities at the Institute.

Areas of Impact

All team members stated that the Institute was personally beneficial to them. Each team member discussed personal gains in relation to previous knowledge and expertise. Team members testified to the following gains in personal and professional development:

1. An increased knowledge of careers available in business and industry, the training needed for specific careers and the expectations of employers
2. An increased understanding of the role of business and industry and of training programs offered in business and industry
3. A broadened perspective on career education
4. A better understanding of group dynamics
5. An increased ability to deal with cultural differences

Perceptions of the team members of the value of the Institute compared to other in-service experiences are reported in Table 4. The rankings of each team member and a team average are shown. The rankings are on a quartile basis.

Table 4

Value of Institute Compared to Other In-service Experiences of Team Members from School District D

Team Members	Quartile Scale			
A	1	2	3	(4)
B	1	2	3	(4)
C	1	2	(3)	4
D	1	2	3	(4)
E	1	2	3	(4)
F	1	2	3	(4)
Average Ranking	3.8			

The personal and professional gains claimed by team members were not confirmed by other testimony since team members did not have a role in the implementation of the team plan. Other interviewees who work with these team members stated the team members were no more involved in career education programs and activities after attending the Institute than they had been before.

Team members stated that the programs and activities at the Institute that were most helpful in promoting personal and professional development were (1) the shadowing experiences in industry, (2) presentations by individuals from business and industry, (3) the sharing of ideas and perspectives with participants from other areas of the country, (4) sessions on group dynamics and (5) the socialization among and between groups.

The goal of the team plan was to insure the family unit's appreciation for understanding of and involvement in the career education program in the school district. The plan included an in-depth explanation of the philosophy of career education and of several different theories on career clusters and personality match, several different surveys for parents and students, a guide to conducting parent workshops and activities for these workshops. One career education staff member stated that the plan was like a college term paper: it was too general and not geared toward low income parents; it had a lot of theory; and only a few of the activities were realistic for the parents who would attend the workshops. Team members stated that they had several meetings with the director of career education on weekends during the Institute to review the development of the team plan and to get feedback from this individual.

When the team returned from the Institute three of the team members met with the director of career education to present their plan. These team members stated that they received no feedback at that time or since regarding the plan. The team members stated that they have not shared the plan with any other educators in the district.

Two career education staff members developed modules for parent workshops at the elementary and secondary levels. One of these staff members stated that the team plan was used as a resource in developing the modules for the parent workshops. The directions and basic topics in the plan were used as a starting point, but some of the activities and concepts in the plan were simplified to suit the level of the parents involved. This staff member stated that eight workshops consisting of six three-hour sessions were conducted. Records showed that a total of fifty-four parents participated in the eight workshops. Parents were paid approximately five dollars per session. Interviewees stated that the workshop participants developed a positive attitude towards the school and some worked in the school as volunteers. The majority of parents participants interviewed stated that they were already highly involved with the school through the PTA and volunteer work before participating in the workshop. Most of the parents interviewed stated that the workshops helped them to relate better with their children concerning career choices. A career education staff member stated that the workshops were ended due to the small number of parents involved and a lack of funds to pay participants.

An unintended outcome resulting from the team's participation in the Institute was that two of the team members, through their own initiatives, were able to involve a number of parents in their classroom program. These team members stated that they called parents and others to have them make presentations to their classes and be interviewed by them. Together, they claimed to have had thirty different individuals visit their classes.

Post-Institute Factors

The primary factors that had a negative influence on the impact of the Institute on the district were

1. Low parent involvement in the schools
2. Lack of initiative and involvement on the part of team members in implementing the plan
3. Excessive amount of philosophy, theory and idealism in the team plan
4. Low visibility of the plan
5. Lack of support for the plan from the team or the career education staff.

Suggestions for Improving the Institute

Many of the interviewees in School District D made suggestions for improving the Institutes. These suggestions were

1. Include more pre-planning at the central office of the district as part of the design of the Institute.
2. Require the key person in the school district who will be implementing the plan to spend some time assisting the team at the Institute. Ideally, this person should spend two days at the beginning of the Institute and two days during the fourth week with the team, providing guidance and a realistic approach.
3. Hold institutes for a shorter period of time and focus on central office people and staff trainers as participants.
4. Develop follow-up support services, such as practical consultation on the implementation process. This follow-up could be scheduled for one weekend every two months.
5. Select districts with a similar level of development in career education.
6. Include administrators and counselors on teams. Classroom teachers do not have the perspective needed to develop a career education plan for the district.
7. Insure that team members have common goals and interests so that they can function effectively.
8. Put less emphasis on socialization at the Institute.
9. Include some focus for elementary level participants.
10. Center the Institute around the environment and operation of an industry or consortium of smaller industries rather than on an academic environment.
11. Focus on individuals, not teams. Participants do not go to the Institute as a team, do not function as a team at the Institute or after returning to the district. For a team to be effective all members need to be from the same school building.

School District E

Background

School District E ecompasses a city with a population of 80,000 and adjoining rural areas. The socioeconomic composition of this area is primarily lower middle class and lower class. The enrollment in this district for the 1978-79 school year was 50,000, with 15,000 students enrolled in the sixteen high schools. The racial composition of this district was 50 percent white and 50 percent black. School statistical records for 1978 showed that 60 percent of the graduates entered postsecondary education programs. The per pupil expenditure was $1,000. The student-teacher ratio was 25 to 1. The school district received CETA funds totaling $103,000 for the 1978-79 school year. These funds were used to provide stipends to students and to pay the salaries of three coordinators who assist with a job observation program. This school district received no other federal or state funding for career education.

For several years prior to the team's participation in the Institute, career education was becoming a priority in the district. During the 1973-74 school year a district-wide needs assessment identified career education as a high priority among students, teachers, parents, and the community. During the 1974-75 school year the position of career education coordinator was established. The central administration and school board voiced support of career education programs and activities, but the career education coordinator operated without a budget. During these several years before the Institute career education activities consisted of (1) in-service

training for teachers, primarily mathematics teachers, on the theory of career education and on curriculum infusion, (2) the testing of career education materials and activities in the classroom and (3) revising and improving curricula with regard to career education in selected classrooms and subject areas. At the time of the Institute career education received support from approximately 50 percent of the classroom teachers, but this varied greatly from school to school and was closely related to the orientation of the principal. The guidance counselors were described as the group most open to the career education philosophy and approach.

During the summer of the Institute a Work Education Council was formed among forty area businesses and the Chamber of Commerce. This council was formed primarily through the efforts of a dean at the local community college in an attempt to bring together business and industry people not typically involved in public education. This council and its small staff has been funded through the National Manpower Institute.

Summary

The reported impact of the Institute on School District E was high. The Institute was instrumental in promoting the personal and professional development of team members in a variety of areas, in enabling the development of a job observation program for secondary students involving many local businesses and industries and in promoting a more positive attitude among the secondary faculty throughout the district toward the infusion of career education into the curriculum. The team plan developed at the Institute was fully implemented in the district. Among the many factors that facilitated the high impact of the Institute in this school district were the professional role and initiatives of the team members, the completeness of the team plan and the strong support of the team's initiatives by the central administration, secondary principals and guidance personnel, and area business and industry.

Pre-Institute Factors

The community relations manager at the local General Electric plant sent a letter and Institute brochure to the superintendent of the district in February, inviting the school to send participants to the Institute. The central administration then made the decision to send participants to the Institute. The director of guidance and the director of career education were asked to assemble a team of participants and the director of career education was asked to be a member of the team. Information on the Institute at this time covered the objectives, duration and accommodations.

The selection of team members began in March. At this time the director of career education made an announcement explaining the Institute to mathematics and science teachers at an in-service meeting. Information passed on at this time consisted of details on the duration and focus of the Institute and on the graduate credits that would be earned. Interested teachers were to fill out applications after the in-service meeting. Only three teachers applied. The director of career education then began contacting individuals to solicit interest in attending. This approach was more successful, and five individuals agreed to participate. However, in May two of the team members canceled and the director had to find two other individuals interested in participating. One of the team members was asked to participate the night before the Institute was to begin. Interviewees stated that the major factor limiting the number of staff members interested in attending was the length of the Institute.

No specific criteria were used to select team members. Some of the team members had a previous interest in and commitment to career education and others did not. The team consisted of the director of career education, three teachers and one guidance counselor from four of the district's secondary schools.

Team members gave the following reasons for deciding to participate in the Institute:

1. To develop new programs and activities for the district
2. To gain knowledge and expertise in career education and guidance

3. To obtain graduate credit required for maintaining teacher credentials

4. To satisfy the director of career education.

The team met as a group four times before the Institute. The first two meetings in April were held to determine the goals the team would address at the Institute. The goal decided upon was the development of a plan for a job observation program for juniors and seniors in the district that would complement the existing K-12 career education program. The team also met with the Institute director in April to discuss team goals, to give background information on the district and to submit individual applications. The Institute director discussed with the team some specifics on the Institute and the Institute schedule. A fourth team meeting was held in May with the central administration, the director of the Chamber of Commerce, and the community relations manager from the local General Electric plant to review the team goals and to obtain the support and commitment of these individuals for the plan the team would develop at the Institute. The two team members who were selected in May and June were not present for these meetings.

Areas of Impact

Team members testified to the following personal and professional gains resulting from their participation in the Institute:

1. Broader knowledge of educational philosophy and ideas

2. Better interpersonal skills and guidance skills

3. Greater appreciation of the role of business and industry and an increased knowledge of working conditions, career opportunities and training programs in business and industry

4. New perspectives on career education and a practical knowledge of how to use career education in classrooms

5. Greater appreciation of the values and needs of various minorities.

These personal and professional gains were evident in the role these individuals played in implementing the team plan and in the enthusiasm they have shown for other career education programs. All team members stated that they were totally committed to career education after participating in the Institute.

Perceptions of the team members of the value of the Institute compared to other in-service experiences are reported in Table 5. The rankings of each team member and a team average are shown. The rankings are on a quartile basis.

Table 5

Value of Institute Compared to Other In-service Experiences of Team Members from School District E

Team Members	Quartile Scale			
A	1	2	3	(4)
B	1	2	3	(4)
C	1	2	3	(4)
D	1	2	3	(4)
E	1	2	3	(4)
Average Ranking	4.0			

These personal gains were confirmed by the testimony of other educators who have had a great deal of interaction with the team members. One individual stated that, at a minimum, the Institute gave team members a better working knowledge of career education and its uses in their professional roles. Others testified that the three teachers who were team members have become leaders among their peers and are utilized as career education resource people in their schools. Another team member, the guidance counselor, has become an assistant principal at one of the secondary schools. An interviewee stated that the Institute provided the director of career education with very valuable insights and knowledge for a person in this position.

Team members stated that the most beneficial aspects of the Institute in promoting personal growth were (1) the shadowing experiences, (2) the comradery that developed among team members, (3) the personal growth sessions and (4) the sharing of ideas and perspectives on career education and guidance with participants from other districts.

The team plan focused on the development of a job observation program in the secondary schools. The plan described in detail the activities and responsibilities of all individuals and groups involved in the program, which included students, parents, sponsoring teachers, guidance counselors, advisory council members and businessmen. In addition, all forms needed to operationalize the program were developed by the team and included in the plan. The format and strategies for in-service meetings for teachers in each of the schools participating in the program were included in the plan. The plan was completed at the Institute and ready for immediate implementation in the school district. The team members drew up a schedule of in-service meetings in the high schools to present the team plan. Team members accepted responsibility for conducting in-service meetings, developed and rehearsed the meetings while at the Institute. Team members stated that the resource materials and team consultants at the Institute were very helpful in developing the team plan.

Upon return from the Institute, the team met with a central administrator to share their experiences at the Institute and to explain the plan. This administrator was very supportive of the team plan and presented it to other central level administrators. In October, the team explained the plan for a job observation program to the Work-Education Council and received support from all of the forty area businesses represented by the council. These forty businesses became actively involved in this program during the first year.

In-service meetings of one and one-half hours were held in the twelve high schools that chose to participate in the job observation program. These in-service meetings dealt with the concept of career education, infusion of career education into the curricula and an explanation of the job observation program. In some schools, the principal required all teachers to attend the in-service meetings while in others only those teachers interested in the job observation program attended. Interviewees stated that one of the major effects of the in-service program was to offer a starting point to individuals who were interested in career education.

In some of the high schools, the director of career education met with the eleventh grade classes to explain the job observation program. In other high schools, the homeroom teachers were responsible for informing the students. All homeroom teachers in the high schools were given written information explaining the job observation program and application forms for students.

An evaluation of the job observation program showed that in the first year of the program, 220 students visited forty local businesses to observe employees and working conditions in career areas of their interest. The job observation experience differed considerably. Some students spent only one or two hours observing employees in a local business, others had one or two full days observing the operations of an area business and others spent several hours a week for three to six months in training programs for specific career areas such as health. Student interviewees expressed a great deal of enthusiasm for the program and all stated they had benefited from the experience. Many of the students interviewed stated that as a result of the program they were now exploring alternative career choices they had not previously considered. Many of the teachers and principals interviewed felt that this program was very worthwhile and beneficial for students and effective in beginning to fill the gap between school and the world of work.

The program showed signs of expanding in the second year; 250 students had participated during the first semester of the school year and another 250 students were expected to

participate during the second semester. Many of the businesses involved in the program had increased the number of students they would accommodate during the second year. Business persons who were interviewed expressed much enthusiasm and support for the job observation program and a willingness to strengthen their ties with the local schools.

One unintended outcome resulting from the team's participation in the Institute was the increased visibility of and support for all career education programs and activities in the secondary schools. An interviewee stated that the in-service program conducted by the team members and the involvement demanded of sponsoring the job observation program has developed a greater awareness of the need for career education in the classroom teacher. One counselor stated that many of the teachers who sponsored students in the program were not oriented toward career education but now try to use it in the classroom as much as possible.

The guidance counselors have assumed the role of coordinating the job observation program in the high schools. One counselor stated that this program has increased the role guidance personnel play in the school's career education programs in several ways. First, each student participating in the job observation program must meet with the guidance counselor before visiting the job site. Secondly, the increased contact of counselors with classroom teachers regarding career education and the job observation program has provided more opportunities to involve teachers in infusing career education into the daily curricula.

Post-Institute Factors

The major factors that had a positive influence on the impact of the Institute on this district were

1. Professional roles and personal initiatives of the team members
2. Availability of a completed team plan ready for implementation when the team returned to the school district
3. High visibility of the team and plan through presentations and in-service meetings with the central administration, Work Education Council and secondary faculties
4. Strong support of the team's initiative from the Work-Education Council and central administration
5. Support for the team plan from the secondary principals and guidance personnel
6. Student interest and support for the job observation program.

Suggestions for Improving the Institute

Many of the interviewees in School District E made suggestions for improving the Institutes. These suggestions were

1. Continue the growth groups. They were outstanding.
2. Continue use of the team concept. It is the only approach to use in implementing career education programs in more than one school of a district.
3. Continue dividing time between experiences in industry and at the Institute.
4. Make a greater effort to match the expertise of speakers to the topics of their presentations.
5. Allot more time during the day to working on the team plans.
6. Provide a one week follow-up for the team members at the Institute one year later and focus on problems that arose in implementing the team plans and on alternative implementation procedures.

7. Improve schedule coordination so that all participants arrive at the General Electric plant and other industries at the same time.

School District F

Background

School District F is located in a city and surrounding county with a population of 90,000. The socioeconomic status of this community is diverse and includes urban, suburban, and rural groups. The enrollment in the school district for the 1978-79 school year was 21,500. The racial composition of the district was 57 percent white, 42 percent black and 1 percent other. Placement follow-up showed 58 percent of all graduates enrolled in postsecondary education programs, 22 percent entered the military and 20 percent entered into full or part time employment. The student-teacher ratio was 17 to 1. The per pupil expenditures for the 1978-79 school year were $1,081. This school district received state funding for career education for three years, 1973-76. This funding was used to pay the salary of a director of career education who was to develop a district-wide plan for grades K-12, to buy career education materials, to hold in-service sessions for a teacher-counselor team from each school, and to pay resource people to help develop the county plan and conduct in-service training.

In 1973, the state legislature mandated all school districts in the state to implement career education. The state gave funding to local school districts to facilitate the implementation of career education. At this time, the school board in this district named career education as a priority and established the position of director of career education. A district administrator stated that even though the school board made career education a priority, it was not very supportive or interested. The former director of career education stated that during the three years of state support, curriculum activities related to career education focused on infusion of career education in the K-12 curriculum. During the three years of funding in-service training programs were conducted for approximately 30 percent of the teachers from all subject areas and all schools. The former career education director stated that a great amount of career education materials were purchased during that time. An administrator stated that when the state funding stopped career education was no longer a priority of the district. All in-service programs were stopped and the position of career education director was eliminated.

Prior to the Institute career-related activities in guidance consisted of testing tenth graders for aptitude and holding individual and group sessions focusing on the test results and on the decision-making process in regard to career education. Also, all secondary schools in the state have been required by law since 1971 to have an occupational specialist. The responsibilities of the occupational specialist have included career counseling, student placement and follow-up and acting as a classroom resource person.

Summary

The Institute was reported by interviewees to have had a moderate impact in School District F. The Institute was instrumental in promoting the personal and professional development of team members in a variety of areas, in enabling the development of new and revised curricula to provide career information and exploration in one secondary school and in changing the guidance strategies in this secondary school to emphasize career education. There were many factors that facilitated the impact of the Institute in this one school and limited the impact of the Institute in other schools in the district, including the professional role and initiative of each of the team members and the level of support for the team plan from the administration at the different schools.

Pre-Institute Factors

The local General Electric community relations representative contacted the superintendent of this district in March to invite a team to participate in the Institute. This initial contact was made by mail and consisted of an Institute brochure and cover letter explaining the Institute. An

administrator stated that the superintendent decided that participation would be worthwhile for the school district and passed the information on to the director of career education and the director of guidance. These two administrators were responsible for assembling a team. Information on the Institute at this time included details on objectives, duration, expenses, and location of the Institute and suggestions for the composition of the team.

Team selection started in late March. The two district administrators stated that all principals in the secondary schools received letters explaining the Institute and asking them to make the faculty aware of the Institute. However, there was little response from the faculty due to the time commitment involved. One administrator stated that an attempt was made to have administrators, counselors and teachers from the same school on the team but this proved impossible. In the end, those who were interested and working in career education and available to attend for five weeks were selected for the team. One administrator stated that the factors limiting the composition of the team were

1. Length of the Institute
2. Family commitments and responsibilities
3. Conflicts with plans for summer graduate courses at the local university
4. Distance to the Institute.

The team consisted of three teachers from one secondary school and one guidance counselor from a different secondary school. An administrator stated that the three teachers were contacted directly and asked to participate because they were working in areas directly related to career education. The guidance counselor wanted to attend because of interest in career education and free time during the summer.

Team members stated that two team meetings were held before the Institute. The first meeting was with the director of career education and the goals of the team plan were discussed. The teachers and counselor had different goals so the director of career education assigned the goal of developing the scope and sequence of career education for grades 7-12. The second team meeting was with the Institute director in mid-May. At this time, team members filled out applications and developed goal statements for the director.

Team members stated that information on the Institute was generally adequate; however, they could have benefited from more information on the Institute schedule and on the need to bring resource materials to the Institute.

Areas of Impact

Team members testified that they made the following gains in personal and professional development through participation in the Institute:

1. An increased knowledge of the role of business and industry
2. An increased knowledge of careers and training programs available in business and industry
3. An increased knowledge of worker roles and the education necessary for different careers
4. An increased level of interpersonal skills and group skills
5. A broader perspective of career education
6. An increased knowledge of the career education resources available.

Perceptions of the team members of the value of the Institute compared to other in-service experiences are reported in Table 6. The rankings of each team member and a team average are shown. The rankings are on a quartile basis.

Table 6

Value of the Institute Compared to Other In-service Experiences of Team Members from School District F

Team Members	Quartile Scale
A	1 2 3 (4)
B	1 2 3 (4)
C	1 2 3 (4)
Average Ranking	4.0

Administrators who have had many interactions with the team members stated personal and professional gains by the team members were evident in the classroom performance of team members who were teachers and in the changes in the career education programs in the one secondary school of the team member who was a counselor.

Team members stated that the most beneficial aspects of the Institute were (1) the shadowing experiences in industry, (2) the interaction with participants in sharing ideas and techniques, (3) the group dynamics sessions and personal growth sessions and (4) the group setting and living arrangements.

The goal of the team plan was to provide a developmental, sequential program for grades 7-12 that would prepare students to make a successful transition from the classroom to becoming a productive, participating, self-fulfilled member of society. The plan included an in-depth analysis of the philosophical and theoretical aspects of life learning and values clarification, specific recommendations for the role that administrators, school board members, counselors and teachers would play in implementing the plan, guidelines for in-service training for faculty, and procedures to be followed for evaluating the success of implementing the plan. The team members who were teachers stated that during the third week of the Institute they realized that they did not have the authority or influence to be able to implement the plan in their school. From that point on, the plan was developed for the counselor's school only. These team members stated that they have used the basic ideas of the plan in their classrooms but they did not attempt to implement the plan in their school.

Administrators stated that upon return from the Institute one team member met with the director of career education and the director of guidance to explain the team plan and to give them copies of it. The team member stated that copies of the plan were also given to one non-team counselor, to the superintendent, and to a principal at one of the high schools.

The team member stated that three sessions were held to discuss the plan and Institute experiences of this team member. These were

1. One hour at the high school counselors pre-school planning meeting
2. One hour at the middle school counselors pre-school planning meeting
3. One hour at this team member's high school pre-school planning meeting of all faculty members.

However, none of the teachers interviewed in this school could remember a meeting where the Institute or team plan were explained. Many interviewees, both administrators and teachers, confirmed that the following career education programs and activities have been initiated in their high school by the team member since participating in the Institute:

1. An increased use of testing by the guidance personnel in evaluating and guiding students toward curricula and career choices.

2. An increase in the number of teachers who include career education in classroom curricula effected by two staff meeting presentations by the team member and a great deal of one-to-one help and encouragement.

3. A new two year course for all seventh and eight graders. This course is for one hour per day. Every six weeks the class focuses on a different career cluster. This curricula is designed to prepare students for career choices and to inform them of the curricula offerings in the school that focus on each career area.

4. A new class on employability skills for all students in the seventh grade.

5. An increased use of filmstrips and resource persons in career education by classroom teachers.

The administration of this school expressed a great deal of support for the career education programs and activities initiated by the team member. The majority of teachers who were interviewed also expressed support for the efforts of this team member.

Post-Institute Factors

The primary factors that had a positive influence on the impact of the Institute on this district were

1. The professional role and personal initiative of the one team member

2. The strong support from the school's administration for all efforts of this team member

3. The support from many of the teachers in one school generated by faculty meeting presentations by and one-to-one interactions with the team members

4. The choice of realistic programs and activities for implementation.

The primary factors that had a negative influence on the impact of the Institute on the district were

1. The non-administrative professional role of the other individual team members

2. The lack of effort and initiative by individual team members to implement the team plan beyond their classrooms.

Suggestions for Improving the Institute

Many of the interviewees in School District F made suggestions for improving the Institutes. These suggestions were

1. Provide materials on activities for implementation in addition to materials on theory and philosophy

2. Investigate teams and team goals before the Institute begins and tailor activities to their needs

3. Utilize the expertise of Institute participants more fully

4. Require that administrators and counselors be included on the teams so that the Institute can have impact on the school district

5. Hold shorter Institutes lasting for three weeks on a local level to enable more individuals to attend

6. Combine the women and minority emphasis and use more than two days for this topic

7. Require all participants to follow one full standard schedule at the Institute.

Summary

The findings reported in this section include the pre-Institute factors associated with participation in the Institute by all six of the districts, the impact in the six districts, the post-Institute factors influencing impact, and suggestions by interviewees for improving the Institute.

Pre-Institute Factors

All six school districts had difficulty recruiting and retaining team members. The reasons for this difficulty were the length of the Institute, the distance from home, family responsibilities and previous summer commitments. School Districts B and D were substitute schools due to late cancellation of other schools. School District B and F had less than five member teams. School District B, C, D and E had one or more team members cancel their plans to participate a few days before the Institute. Substitute teams and individuals were inadequately prepared to participate in the Institute.

Impact of the Institutes

The majority of team members who were interviewed testified that high gains in personal and professional development had resulted from their participation in the Institute. The gains in personal and professional development identified most frequently were an increased understanding of the role of business and industry; an increased awareness of the working conditions, career opportunities, and training programs in business and industry; new and broader perspectives on career education; increased interpersonal skills and group skills and a greater appreciation of the values and needs of various minorities.

Institute programs and activities identified most frequently as promoting personal and professional development were

- The shadowing experiences and tours in industry
- The sessions on group dynamics and personal growth
- The interaction of teams on ideas and perspectives in career education
- The presentations of business and industry representatives
- The resource materials and people available at the Institute.

The value of the Institute compared to other in-service experiences of team members is summarized for each school district and presented in Table 7. The rankings indicate that the experiences at the Institute received a higher ranking than other in-service experiences from all districts except School District C. The rankings are on a quartile basis.

Table 7

Value of the Institute Compared to Other In-service Experiences of Teams Averaged by District and for the Six Districts

Districts	Quartile Scale
A	3.8
B	4.0
C	1.0
D	3.5
E	4.0
F	4.0
Average	3.4
Average (Omitting divergent data of District C)	3.9

The achievement of the Institute objectives is summarized in Table 8 as rated by individual participants in each school district on a four-point rating scale ranging from one (very low achievement) to four (very high achievement). The average of each district's ratings for all eight Institute objectives is provided in the bottom row of the table. The average of ratings by all districts on each objective is provided in the right-hand column of the table. District C ratings were excluded from the computation since they were extremely divergent.

Ratings of achievement were nearly all very high in all districts except District C, which rated the achievement of each objective very low. The average rating of each objective ranged from 3.4 to 3.9 for all five districts. The average of all ratings for all five districts was 3.6, and only two ratings by individual districts were less than 3.0, indicating that participating teams felt that the Institute was very successful in achieving its objectives.

The overall impact of the Institute on the six local school districts was judged to be high in two districts, medium in one and low in three.

The two schools with high impact were School District A and E. In District A the Institute was instrumental in stimulating and motivating some individuals to infuse career education into the curriculum and to develop new career education programs and activities. The team plan was implemented in the pilot schools as planned. In District E the Institute contributed to the development of a job observation program for secondary students involving many local businesses and industries. The team plan developed at the Institute was fully implemented in this district.

School District F experienced medium impact from its participation in the Institute. Impact included the development of new and revised curricula emphasizing career awareness and exploration for all students in one secondary school. The team plan was implemented in one school.

Little impact was observed in School District B, C and D. In District B the team plan developed at the Institute was not implemented. Only one of the team members initiated career education activities. Team members in District C reported that no credit could be attributed to the

TABLE 8

Average of Ratings by Team Members in Each School District on the Achievement of Institute Objectives

	School District						
	A	B	C	D	E	F	All Districts*
1. To ensure that each participant has many opportunities to gain experiences needed to work effectively with children and youth.	3.8	2.5	1.0	3.5	3.8	4.0	3.5
2. To provide the participants with opportunities to develop their skills in group procedures as they relate to career education and guidance.	3.2	3.0	1.0	3.0	4.0	4.0	3.4
3. To give the participants an opportunity to learn the function and significance of industry to the national economy and culture of the United States.	3.4	4.0	1.0	4.0	4.0	4.0	3.9
4. To provide participants with the necessary skills to cope with cultural differences and the ever changing social attitudes within the communities they serve with specific emphasis on minorities and females.	3.0	3.5	1.2	3.3	3.6	4.0	3.5
5. To help participants develop models of the successful person in business and industry.	3.4	3.5	1.0	2.9	3.2	4.0	3.4
6. To provide participants information on the careers and jobs available in industry including required education and experience, incentives and opportunities for advancement.	3.5	4.0	1.0	4.0	4.0	4.0	3.9
7. To give participants information on the educational training programs available for trade, technical and supervisory positions in industry.	3.6	4.0	1.0	4.0	3.8	4.0	3.9
8. To encourage the participants to develop new methods and techniques for meaningful communication with youth about their future.	3.8	3.0	1.0	3.5	3.8	4.0	3.6
ALL OBJECTIVES	3.5	3.4	1.0	3.5	3.8	4.0	3.6

*Ratings for School District C were excluded from the Averages of Objectives for all districts because of the atypical scores which persisted within the district.

Institute for any career education and guidance programs and activities implemented in the district. However, the team plan written at the Institute was used to develop new guidance programs and activities in the district. The plan developed by the team in District D was not implemented, but was used as a resource by the central office career education staff in conducting workshops for parents.

Post-Institute Factors Influencing the Impact

The primary factors that had a positive influence on the impact of the Institutes on school districts were

1. The professional role and initiative of the team members
2. The quality and completeness of the plan brought back by the team to the local school district
3. The agreement of the goals of the team plan with the priorities and budget limitations of the school district
4. High visibility of the team and its plan through presentations and in-service programs conducted by the team for the faculty and administrators
5. Strong support of the plan and the initiative of individual team members from key district administrators
6. Support of the team plan and team members from the principals and guidance personnel in the schools implementing the plan.

The primary factors that had a negative influence on the impact of the Institute on the school district were

1. Lack of support among team members and lack of initiative by team members to implement the plan
2. Lack of support for the plan from key district administrators and school principals
3. Low visibility of the team members and team plan in the school district
4. Discrepancies between the team plan and the predetermined priorities of the school district
5. Emphasis of team plans on the philosophy of career education with very few steps, schedules, or procedures essential to a plan
6. Failure of team members to have the authority or leverage needed to implement the plan.

Suggestions for Improving the Institutes

Suggestions for improving the Institute were made by interviewees in each of the school districts. The most common suggestions across school districts were

- Focus the Institutes more on practical information for implementing career education programs in the public schools and less on career education theory and philosophy.
- Provide some resource materials, such as copies of curricula materials, for teams to take back to their school districts.
- Include administrators and counselors on all teams.

- Focus the Institutes on both secondary and elementary levels.
- Evaluate the needs, goals and expertise of each team more closely and plan the Institute to more fully meet these needs.
- Provide more time during the day for teams to work on their plans.
- Provide more follow-up to the teams.
- Conduct Institutes on a local or regional level utilizing the local General Electric Plant and expertise at local universities.

CONCLUSIONS, POLICY IMPLICATIONS, RECOMMENDATIONS

The overall conclusion of this evaluation study is that *the Institutes achieved their stated objectives and had some impact in each of the school districts included in this study.* It is recommended that Institutes be continued with modifications in the schedule and activities of the Institutes and in pre-Institute and post-Institute operations. This overall conclusion and recommendation is explained in the following discussion of major and related conclusions, policy implications and recommendations. The discussion is in two parts: professional and personal development, and the team and team plan.

Professional and Personal Development

Conclusions

The major conclusion of this aspect of the study is that *the Institutes made a greater contribution to the professional and personal development of participants than most other staff development experiences.* Related conclusions follow.

1. The "shadowing" experiences and tours in business and industry were instrumental in promoting an increased awareness among participants of the roles, working conditions, career opportunities and training programs of business and industry.

2. Group interaction among and between participants from different school districts and states enabled the participants to develop broader perspectives of career education and fuller knowledge of activities for implementing career education programs.

3. The sessions on group dynamics, personal growth and women and minorities helped the participants to develop better group skills and interpersonal skills.

4. Differences in the backgrounds and areas of interest of participants affected the specific gains in personal and professional development of each individual and pointed up the need for alternative program options in each Institute.

5. Activities at the Institutes focusing on general career education philosophy and rationale contributed little to the personal and professional development of participants.

Policy Implications

The leadership of the Institute should consider:

1. Continuing or expanding the programs at the Institute that were found to be most beneficial in promoting the personal and professional development of the participants

2. Deleting the programs at the Institute that were found to be of little benefit to the participants

3. Providing program options to serve the varied professional and personal development needs of participants

Recommendations

Alternatives for accomplishing these policy implications are

1. Continue and expand the schedule of shadowing experiences and tours of business and industry. Approximately one-third of the scheduled time at the Institute should be spent in business and industry.

2. Maximize the interaction among and between teams by scheduling times for teams to discuss with each other the career education programs and activities that are operational and the implementation strategies that had been successful in each district.

3. Continue the sessions on group dynamics, personal growth and women and minorities. Sessions on women and minorities could be combined, since much of the material covered for each topic is similar. Approximately one-third of the scheduled time at the Institute should focus on these activities for professional and personal development.

4. Offer optional classes and presentations as part of the Institute schedule so participants can elect to attend sessions suited to their needs. One option might be classes on career education activities and curricula for elementary teachers.

5. Reduce the amount of scheduled time spent on introductory career education philosophy and rationale. A sufficient amount of time to devote to this topic would be about one day. All other presentations of an introductory nature should be deleted.

Team and Team Plan

Conclusions

The major conclusions of this aspect of the study were that the concepts of a team and team plan were powerful strategies for impacting on career education and guidance programs in local schools, and that teams were difficult to assemble. Related conclusions follow.

1. The professional role and authority of team members were directly related to the breadth of impact in a school district. Teams composed of only classroom teachers had more difficulty in implementing team plans on a building or district-wide basis than did teams that included building and district supervisors.

2. The professional role and authority of team members influenced the support the team plan received from the building or district administrators and the impact of he plan on the building or district.

3. The alignment of goals and activities of the team plan with the school and district priorities influenced the extent to which the plan was implemented.

4. Team plans with the greatest impact contained schedules of activities, assignment of responsibilities and operational procedures necessary to implement the plan immediately upon the team's return to the school district.

5. Team plans that were not implemented in the school districts consisted largely of career education philosophy and rationale and offered few practical activities and procedures for implementation.

6. The team plans that were more successfully implemented were publicized in school and community media.

7. Team members' enthusiasm and commitment to improve career education and guidance programs in their local schools were very high immediately following participation in the Institutes, but the general operation of schools often presented problem conditions that slowed or thwarted the implementation of team plans.

8. The teams that were most successful in developing operational plans and implementing these plans were contacted enough in advance of the Institute (five to six months) to be able to assemble a core team and develop team goals based on the needs of the school district.

9. The impact of the Institute was low in school districts that were invited to partici[illegible] only a few weeks prior to the Institute. These school districts had problems selec[illegible] team members and adequately preparing for the Institute.

10. The cancellation of plans to participate in the Institute by at least one school district annually is a continuing problem and negatively affects the impact of the Institute.

11. The cancellation of plans to participate in the Institute by original team members is a continuing problem in many participating school districts and can negatively affect the impact of the Institute on a school district.

12. Individuals who substituted for original team members had no part in the team's pre-Institute planning, and were inadequately prepared and oriented for the Institute.

13. The length of the Institute, the distance of the Institute from participants' homes, family responsibilities and previous summer commitments were the major factors that limited the number of individuals interested in attending the Institute.

Policy Implications

The leadership of the Institutes should consider:

1. Setting specific criteria for the composition of each team attending the Institute based on goal statements and the needs assessment submitted by the team before the start of the Institute

2. Developing strategies at the Institute that will facilitate the level of support for the team plans in the school districts

3. Placing a greater emphasis in the Institute schedule on practical activities and strategies that teams can use to operationalize the plan upon return to the school district

4. Developing guidelines to be followed by the Institute staff and the local school districts during the pre-Institute planning phase

5. Developing strategies for making the Institute more accessible for administrators, counselors, and teachers.

Recommendations

Alternatives for accomplishing these policy implications are:

1. Create a pool of applicant school districts by

   - Providing information on the Institutes to prospective school districts and requesting applications from these districts eighteen to twenty-four months before the Institute

   - Designing applications to include a description of(a) the school district's priorities and commitment to career education, (b) the goals to be addressed in the team plan, (c) the commitment and support to achieve the goals, (d) the feasibility and probability of achieving the goals, (e) the general strategies that would be sought and developed at the Institute to achieve the goals, (f) the names and positions of team members

   - Requiring approval of the application by the superintendent of the school district.

This pool will be the basis for a more effective process for selecting schools and teams and preparing them to productively use the resources and opportunities of the Institutes.

2. Use the following criteria in the application process to assure a practical relationship of team composition to team goals:

   - Teams that include one or more district administrators (e.g. coordinator of career education, director of guidance or director of instruction) should propose goals of developing plans to implement new career education and guidance programs throughout the district. Other teams members should be administrators, counselors and teachers from different school buildings.

   - Teams that include a school principal, assistant principal or head counselor should pursue goals of developing plans to implement new career education and guidance programs in a school building.

   - Teams that include only classroom teachers from the same or different school buildings should propose goals of developing plans to implement new career education programs and activities in their classrooms only.

   - Teams should be required to change their proposed goals if they do not meet the criteria.

3. Instruct Institute directors to visit school districts that apply to attend an Institute soon after the applications have been submitted to gain background information on the school districts for use when selecting districts.

4. Do not attempt to find school districts to substitute for other districts that cancel plans to attend less than six months prior to the Institute.

5. Select all participating districts from the pool of districts that have an application on file.

6. Focus one-third of the scheduled time at the Institute on the development of team plans. This time would be devoted to team meetings, presentations, group meetings and time with consultants.

7. Schedule at the Institute more presentations that focus on practical activities and strategies that can be used by the teams to implement the team plan.

8. Provide more resource materials at the Institute that focus on programs, activities and strategies that can be implemented in school districts.

9. Use the expertise of individual participants to provide practical knowledge of activities and strategies for the implementation of career education programs that have been successful in their own school districts.

10. Use participants from previous Institutes as staff or consultants to provide knowledge of activities and strategies for the implementation of career education programs that have been successful in their own school districts.

11. Require district administrators and/or school building administrators to be actively involved in the development of the team plan. Provision might be made for having these individuals visit the Institute to work on the development of the team plan for one or two days during the second week of the schedule and one or two days again during the fourth week of the schedule.

12. Require that all team plans include strategies for conducting in-service programs for all faculty and administration involved in the implementation of the plan.

13. Assist all teams to complete their team plan at the Institute so that the plan is ready to be implemented when the team returns to the school district.

14. Assist participants at the Institute to send press releases to local media and develop other related strategies for presenting facts of their participation and the team plan to their school district and community.

15. Enable Institute staff to offer and provide follow-up assistance to local schools where Institute participants are encountering problems in implementing the team plans.

16. Hold Institutes at a local level, serving schools in one or more counties and utilizing facilities, personnel and instructional resources available in that area, such as the local General Electric Plant, other area businesses and industries, local universities, community colleges and technical schools. Such an Institute would be easier for the local educators to attend and could involve local educators in the planning of the Institute. This Institute could focus upon plans to meet the specific career education and guidance needs of the area and could facilitate the continuing involvement of area businesses and industries and the total community in the education of its people.

APPENDIX A

BIBLIOGRAPHY

BIBLIOGRAPHY

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APPENDIX B

SCHEDULE OF QUESTIONS ON IMPACT AND FACTORS INFLUENCING IMPACT

Questions

Questions developed for the first two areas of impact, "Personal and Professional Development of Team Members" and "Staff Development of Non-Team Faculty," were the same and are grouped under the heading *Staff Development*. Questions for the potential areas of impact included repeating sub-questions. These sub-questions dealt with the influence of the team's participation in the Institute, the strategies included in the team plan that were to impact on a particular area, and the effects of the implemented strategies on the intended groups (e.g., students, parents, teachers). An outline of sub-questions that were used in each impact area follows:

- .1 Influenced by the team's participation in the Institute
  - .11 programs or activities at the Institute
  - .12 factors in the pre-Institute period of time
  - .13 factors in the post-Institute period of time
- .2 Strategies included in the team plan
  - .21 specific strategies
  - .22 factors facilitating use of the strategies
  - .23 factors limiting the use of the strategies
- .3 Specifics
- .4 Effects

The first question in the Staff Development section illustrates how the sub-questions were used under each main question for the potential areas of impact. Repeating sub-questions were not used with questions for potential factors influencing impact.

Questions for Potential Impact Areas

Staff Development

1. Has the individual's/faculty's *effectiveness in working with children and youth* increased in the last one or two years?

   IF YES

   1.1 Has the individual's/faculty's increased *effectiveness in working with children and youth* been influenced by the team's participation in the Institute?

   IF YES

   1.11 What programs or activities at the Institute were helpful? Limiting?

   1.12 What factors in pre-Institute period of time were helpful? Limiting? Give examples.

   1.13 What factors in post-Institute period of time were helpful? Limiting? Give examples.

1.2 Were strategies for increased *effectiveness of educators in working with children and youth* specifically included in the team plan?

IF YES

1.21 What strategies were included? Explain.

1.22 What factors facilitated the use of the strategies? Explain.

1.23 What factors limited the use of the strategies? Explain.

1.3 In what specific ways are individuals/faculty more effective in working with children and youth in their professional roles as educators? Give examples.

1.4 What effect has this increase in the individual's/faculty's effectiveness in working with children and youth had on the student population in the school district? Give examples.

2. Have the individual's/faculty's *skills in group procedures*, especially in the area of guidance and counseling, increased in the last one or two years?

3. Has the individual's/faculty's *awareness/appreciation of the role of business and industry* in our culture and national economy changed over the last one or two years?

4. Has the individual/faculty developed *skills to cope better with cultural differences*, especially among minorities and females, in the last one or two years?

5. Has the individual's/faculty's awareness of *career and job opportunities available in business and industry* increased in the last one or two years?

6. Has the individual's/faculty's *knowledge of educational training programs for trade, technical and supervisory positions* in industry increased in the last one or two years?

7. Has the individual/faculty developed *skills to better communicate with youth about their future* in the last one or two years?

8. Has the individual/faculty developed *new models of the successful person in business and industry* in the last one or two years?

Curriculum and Instruction

1. Have *revisions of existing curricula* dealing with career education occurred in the last one or two years?

2. Have any *new curricula* dealing with career education been added to the already existing curricula in the last one or two years?

3. Have any *budget changes* affecting the curricula dealing with career education been made in the last one or two years?

4. Have any *schedule changes* occurred with the curricula dealing with career education in the last one or two years?

5. Have changes occurred in educators' *instructional techniques* dealing with career education in the classroom in the last one or two years?

Guidance and Counseling

1. Have *improvements in the available resource materials* dealing with career opportunities/education occurred in the last one or two years?

2. Have there been any *changes/redirecting or recommended changes* in the approach to career counseling and guidance in the last one or two years?

Community Involvement

1. Has there been any *change in the patterns/level of communication* between the school district and the community in the last one or two years?

2. Have *demonstrations in classes* at school been given by business, industry, labor, government or social service (BILGSS) people on products, functions, processes, or services?

3. Have students or faculty been allowed to *tour/visit* BILGSS facilities to observe their functions, processes, activities and worker roles?

4. Have *shadowing experiences* in BILGSS been provided to students? Faculty?

5. Have *on-site classes* been held at BILGSS facilities for students? Faculty? Why were classes held on-site (e.g. equipment, environment, people)?

6. Have *staff exchanges* been conducted between the school district and BILGSS?

7. Has *parent involvement* been solicited to further career experiences through home-based and school-based activities?

8. Have *other community involvement activities/assistance* been provided to the school district by BILGSS?

Questions for Potential Factors Influencing the Impact

Profile of the School District

1. What is the geographical location of the school district?

2. What is the overall socioeconomic status composition of the community in which the school district is located? Please explain.

3. How many students are enrolled in the school district?

4. What is the racial composition of the school district? Please explain.

5. What percentage of graduates (for school years 1975-76, 1976-77, 1977-78) indicated that they would attend college after graduation?

6. What percentage of graduates/non-graduates entered vocational or trade schools in the years 1975-76, 1976-77, 1977-78?

7. What is the level of per pupil expenditure in the school district? Please explain.

8. Has there been an increase in the number of career education and guidance personnel in the school district in the last three years (1975-76, 1976-77, 1977-78)?

9. What is the student-teacher ratio in the school district?

10. What state and/or federal resources were received by the school district for career education and guidance activities and services?

Attributes of Principal Actors

1. What was the philosophy (attitude) of principal actors toward career education and guidance prior to the team's participation in the Institute? Please explain.

1.1 Superintendent?

1.2 Principals?

1.3 Team members?

1.4 Other educators?

2. What is the philosophy (attitude) of principal actors toward career education and guidance at the present time? Please explain.

3. What was the level of commitment of the principal actors prior to the Institute? Following the Institute? Please explain.,

4. What is the predominant management style within the central administration of the school district? Please explain.

5. What is the predominant management style within the administration of each school in the school district? Please explain.

6. Has the position of individual team members within the school system changed in the last one or two years?

7. In what ways has the professional role of each team member participating in the Institute changed in the last one or two years? Give examples.

Role of Local General Electric Plant

1. Who at the local General Electric plant communicated with the local school superintendent or his representative to solicit the school district's participation in the General Electric Summer Institute for Career Education and Guidance? (e.g. Plant Manager? Education and Training Director?)

1.1 How was this communication made? Please explain.

1.2 When did this communication occur? How many months prior to the Institute?

2. What is the profile of the local General Electric plant as compared to other local industry?

Decision of School District to Participate in the Institute

1. What is the orientation of the local school district towards implementing new and innovative programs in the school system?

2. How was the decision made for the school district to participate in the General Electric Summer Institute for Career Education and Guidance? Please explain.

Selection Process of Team Members

1. How were team members selected to participate in the General Electric Summer Institute for Career Education and Guidance?

2. What factors limited the selection of individuals who were more representative of educators in the school district? Please explain.

3. When were team members selected? (How many months, weeks, days prior to the Institute?)

4. Were alternates selected?

Preparation and Orientation of Team Members

1. Did team members (and alternates) receive information from the Institute explaining its purposes, objectives, schedule, and housing accomodations?

2. Did team members meet with any Institute staff prior to attending the Institute?

3. Were team members (and alternates) able to meet as a group prior to the Institute, independently of the Institute staff member?

4. How could orientation and preparation of team members have been improved? Be specific.

Informing Local Educators about the Institute and Team Plan

1. Was the entire faculty of the local school district informed that selected faculty members from the school district participated in the General Electric Summer Institute for Career Education and Guidance?

2. Was the entire faculty of the local school district informed of the plan developed by the team?

Support Plan

1. Has the local General Electric plant manager, representative and/or staff given the local school district support in implementing the plan developed at the Institute?

2. Have team members supported each other in implementing the plan in the school district?

3. Has the General Electric Institute staff supported teams in implementing the team plan?

4. Has the superintendent of the school district supported the implementation of the team plan?

5. Have the principals of the individual schools in the school district supported the implementation of the team plan?

6. What was the overall level of support for the team plan among other educators in the school district? Please explain.

The Summer Institute

1. What programs and/or activities at the Institute were most helpful? Least helpful? Please explain.

2. What programs and/or activities at the Institute should have been included but were not? Please explain.

3. What programs and/or activities at the Institute should be discontinued? Please explain.

APPENDIX C

LETTERS TO SCHOOL DISTRICTS

THE GENERAL ELECTRIC FOUNDATION
1285 Boston Ave., Bridgeport, Conn. 06602 · Tel. (203) 334-1012
William A. Orme, Secretary

cc: K. E. Gray
Local GE
Representative
T. Pierson

Superintendent
School District
Address

Dear

For a number of years the General Electric Foundation has been funding career education programs, including a series of Summer Institutes on Career Education and Guidance at universities around the country. As you may recall, a team from your school system participated in our program at (Indiana University or the University of South Carolina).

We are pleased that the National Center for Research in Vocational Education at the Ohio State University has agreed to help us evaluate and improve our Summer Institutes. Dr. Kenney Gray and Mr. Terry Pierson of the Center are conducting this study.

As one part of their evaluation, they will visit a number of school systems that had provided teams for our summer programs, and your school system is among those they would like to visit. This is, of course, not an evaluation of career education in your system, nor even of the participants in our program, but rather an evaluation of our Summer Institute program itself.

Dr. Gray or Mr. Pierson will call you during the week of (date) to answer any question you may have about the study and, with your concurrence, to arrange the time and location of their visits and to obtain the name of a person you would like to designate as their contact. Please share with them a copy of the plan developed by your team at the Summer Institute and any other materials which describe Institute-related efforts of the team and school. Your team in the Summer Institute included (Names of the team members).

We at the General Electric Foundation are pleased to have been able to work with you in the past and look forward to your participation in this study to help improve our future Summer Institutes. Thank you.

Cordially,

WAOrme

THE NATIONAL CENTER
FOR RESEARCH IN VOCATIONAL EDUCATION
The Ohio State University · 1960 Kenny Road · Columbus, Ohio 43210
Tel. (614) 486-3655 Cable: CTVOCEDOSU/Columbus, Ohio

Contact Person
School District
Address

Dear

This is to follow-up my conversation with you concerning the evaluation of the General Electric Foundation Summer Institutes on Career Education and Guidance. I would like to reconfirm our plans for a three day visit to the school district and provide you with further information concerning the evaluation study.

Interview Team

The interview team is Dr. Kenney Gray and Mr. Terry Pierson. Both Dr. Gray and myself are full time staff members in the Evaluation and Policy Division at the National Center for Research in Vocational Education. The Evaluation and Policy Division conducts evaluations in the areas of vocational education, career education and guidance, and private sector business and industry training programs.

Project Abstract

Twenty copies of the project summary are enclosed for you to use as needed in communications you have with school personnel.

Interviewees and Schedule

As discussed in our conversation on (Date), we need your help in identifying 15 to 20 individuals in the school district who would be most beneficial to interview for our study. We would like all team members in the school district to be scheduled for interviews. Other suggested interviewees are: the superintendent of the school district or other district level administrators, the career education coordinator for the school district, the principals of the schools where team members are located, other teachers and counselors in the schools where team members are located, students, the local G.E. representative who contacted the school to solicit participation in the Summer Institute, one or more board members, parents, and personnel from local business and industry if possible and beneficial.

Dr. Gray and I will be conducting private interviews separately so you may schedule two interviews for each time slot. For team members and school administrators please schedule one forty-five minute interview per hour for each of us, leaving fifteen minutes unscheduled, should more time be needed with an interviewee and to provide the interviewer with a few minutes to reorganize between interviews. For other counselors and teachers two thirty minute interviews per hour may be scheduled for each interviewer. We would like to have all individuals from the same school building scheduled consecutively. For each school building if possible please schedule the principal first, followed by team members then other faculty. We would like the district level administrators (e.g., superintendent, and career education coordinator) scheduled last. Other individuals not in the schools may be scheduled during any open time slot.

Documents

The following is a list of documents and information we need in advance of our visit:

1. The Needs assessment developed by the team members prior to the Summer Institute
2. The Team Plan developed at the Institute
3. Annual Community Progress Report for school years 1976-77, 1977-78, 1978-79 (i.e., the type that is shared with citizens of the community)
4. Budget Reports for school years 1976-77, 1977-78 and 1978-79 if not included in the Annual Community Progress Report
5. Evaluation Reports of Career Education Programs (e.g., follow-up reports to the Summer Institute director)

Other documents and information we will review during our visit are:

1. Directories of Community Resources
2. Staff Resource Materials
3. Correspondence Related to the Summer Institute or Team Plan
4. Board Approved Documents Referencing the Team Plan (e.g., Resolutions, Position Statements, Meeting Minutes)
5. Other Important Documents and Memoranda Related to Career Education Programs and Activities in the School District

We will rely on documents for information whenever it can minimize interview time with the staff.

I will call you during the first week of January to further discuss the items noted here and to answer questions you may have. We are pleased to be working with you in this evaluation study.

Sincerely,

Terry Pierson

tlr

Enclosures

RELATED PUBLICATION

A summary of this report is provided in the following report:

Gray, K. E. and Pierson, T. K. *Evaluation of the General Electric Foundation Summer Institute on Career Education and Guidance: Executive Summary*. Columbus: The Ohio State University, The National Center for Research in Vocational Education, 1979.